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of

# OCCUPATIONAL THERAPY

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## TABLE of CONTENTS

### ARTICLES

	Page
Tendon Transplants of the Hand and Their Treatment in O.T. <i>Mary Schroder, O.T.R.</i>	339
Considerations for Prevention of Blindness and Conservation of Vision . . . . . <i>Evelyn M. Carpenter</i>	348
Curare and Its Effect on Rheumatoid Arthritis . . . . . <i>Elizabeth Collins, O.T.R.</i>	352
The Hospital Librarian Speaks to the Occupational Therapist . <i>Helen Becker</i>	354
Finger Painting in an Occupational Therapy Program . . . . <i>Peter J. Napoli, Ed.D., and Beatrice E. Gold, O.T.R.</i>	358
A Glimpse into an Aphasic's World . . . . . <i>Eleanor T. Albertson, O.T.R.</i>	361
The Over-all Treatment of Poliomyelitis . . . . . <i>Edward W. Lowman, M.D.</i>	365

### DIVISIONS

School Section . . . . .	369	Association Personnel . . . . .	380
O.T. Department . . . . .	373	Committee Reports . . . . .	386
People You Should Know	376	Special Groups . . . . .	390
Editorial . . . . .	377	Delegates Division . . . . .	391

### FEATURES

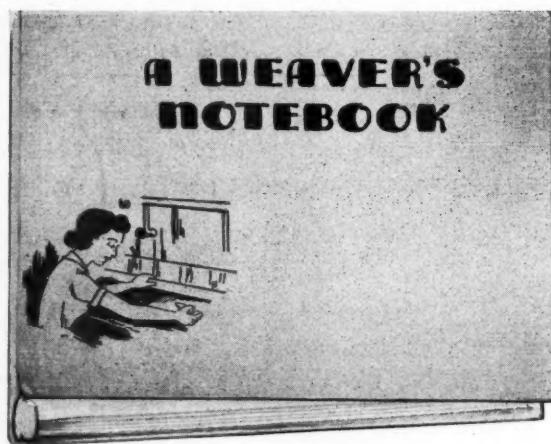
Convention . . . . .	379	O.T. Items . . . . .	397
Retiring Officers . . . . .	391	Shop Hints . . . . .	399
Special Notices . . . . .	393	Letters . . . . .	400
Do You Know That . . . . .	395	Book Reviews . . . . .	400

### INDEX TO VOLUME I . . . . . 402

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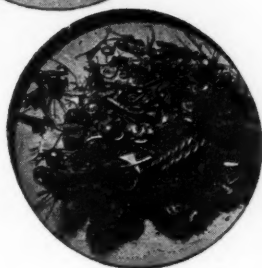
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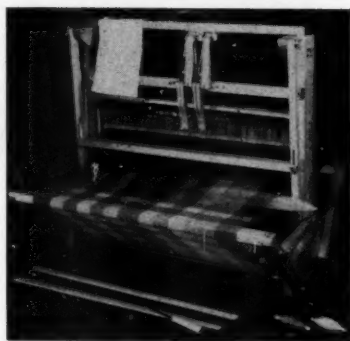
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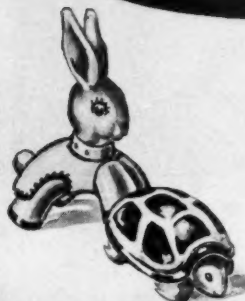


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## OCCUPATIONAL THERAPY

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VOL. I, NO. 6

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### Tendon Transplants of the Hand and Their Treatment in Occupational Therapy

#### SURGICAL ASPECTS OF TENDON TRANSPLANTS

By MARY SCHRODER, *Percy Jones General Hospital, Battle Creek, Mich.*

In tendon transplants, the insertion end of a healthy muscle is transferred to a neighbor tendon in order to perform the function of that impaired muscle. When a group of muscles is paralyzed, the opposing unaffected group pulls the limb into a deformity. By transferring a portion of the strong group, a better balance is set up whereby the function of the paralyzed group is restored in part. In general, the formulation of the basic principles in the correct after-treatment of tendon transplants has been designed to achieve, through reeducation, coordinated function of the involved muscles working in normal conjunction with other muscle groups.

In transferring tendons the following principles are followed as given by Bunnell<sup>1</sup>:

1. First, before the transferring of any tendon, bones must be in good alignment and joints must be free so that the limb can assume the desired position without resistance.

2. The muscle of the transferred tendon must be healthy and adequate in size to carry on the muscle balance and the new motion desired.
3. It is preferable that the transferred muscle have an allied function.
4. The transferred tendon should be placed in a bed through which it can glide.
5. The transferred tendon should pull in a straight line.
6. The amplitude of motion of the transferred tendon should be sufficient to execute the motion desired.

In contemplating transfer of tendons in the forearm from the flexor to the extensor group, there are in general three tendons needed to furnish extension to the wrist, fingers and thumb; and three to furnish flexion to the fingers and thumb and opposition to the thumb. The available muscles in the extensor group are the extensor carpi radialis longus and brevis, the extensor carpi ulnaris and the supinator longus. Those available in the flexor group are flexor carpi radialis, flexor carpi ulnaris, palmaris longus and the pronator teres.

<sup>1</sup>Bunnell, Sterling, *Surgery of the Hand*, 1944, Lippincott, pp. 293-298, 371-374.



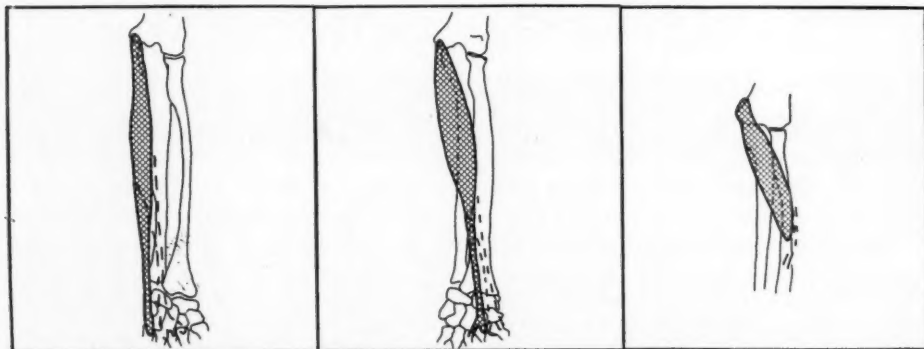
If there should be an insufficient number of muscles available for transfer, the wrist should be arthrodesed in dorsi-flexion. This results in little disability and makes the 5 or 6 powerful tendons that move the wrist available for use on the digits. This is usually done if any two of the median, radial and ulnar nerves are not functioning.

#### (1) PARALYSIS OF RADIAL NERVE

For paralysis of the radial nerve above the elbow with resulting drop wrist and inability to extend thumb and fingers (with the exception that the distal two joints of the fingers can be extended by the intrinsic muscles, and some supination can be supplied by the biceps), three tendon actions are needed and four flexor tendons available.

The following combination is used for transfer:

1. The upper ends of the flexor profundus tendons to the ring and little fingers can be detached from their muscles and imbedded into the flexor profundus tendons to the index and long fingers
2. The supinator longus muscle can be passed over to give additional strength to these four profundus tendons.
3. The tendon of the extensor carpi radialis brevis can be attached to that of the flexor pollicis longus.
4. The flexor carpi ulnaris tendon can be used to furnish opposition to the thumb. Further discussion will follow on transfers for opposition.



A good combination is as follows:

1. Flexor carpi ulnaris is transferred to long extensors of long, ring and little fingers. See Fig. 1.
2. Flexor carpi radialis is transferred to the long extensor of the index and also to the long extensor of the thumb. See Fig. 2.
3. Pronator teres is transferred to extensor carpi radialis longus and brevis. See Fig. 3.
4. The palmaris longus is transferred to the tendon of the abductor pollicis longus. See Fig. 4.

#### (2) PARALYSIS OF MEDIAN NERVE

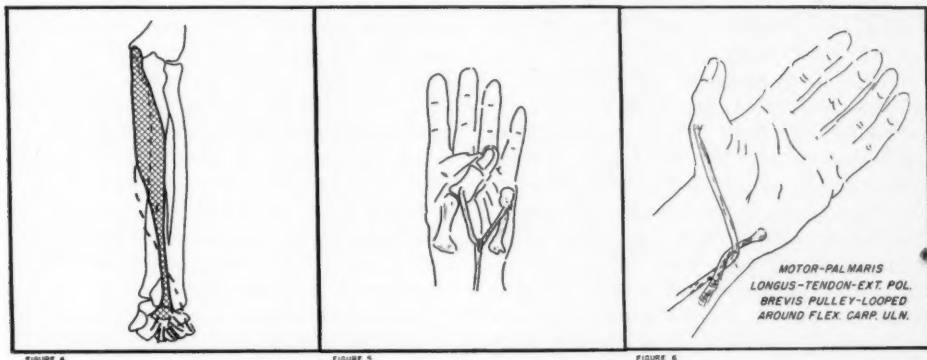
Here we need three actions (flexion of the fingers, flexion of the thumb, and opposition of the thumb). The flexor profundus muscle to the ring and little fingers and the flexor ulnaris muscle are functioning.

#### (3) PARALYSIS OF ULNAR NERVE

In ulnar nerve paralysis when repair of the nerve is no longer possible there is need for restoration of carpal and metacarpal arches and ability to adduct the thumb. Also intrinsic muscle balance should be restored to the little and ring fingers. Normal motion position and strength of grip depend on the balance of the extensor group and the intrinsic. With loss of the intrinsic function, the hand loses its skill and fine movements.

In order to furnish the following intrinsic motion, extension of the distal joints of the ring and little fingers, flexion of the proximal joints and lateral motion of the fingers, the flexor sublimis tendons are detached from their insertions, withdrawn from the palm, divided and passed down the lumbrical canals and attached to the transverse fibers and lateral bands of the fingers. (The middle joint is already

## TENDON TRANSPLANTS OF THE HAND



in flexion deformity so loss of the sublimis is of less importance.)

In ulnar nerve paralysis the operations to restore adduction to the thumb and curvature to the carpal and metacarpal arches are the tendon loop operation and the tendon T operation.

The tendon loop operation: the tendon of the extensor digitorum communis to the index finger is detached and prolonged with a tendon graft and then passed subcutaneously around the ulnar border of the hand and across the palm under the flexor tendons to act as an adductor of the thumb.

In the tendon T operation to restore adduction a tendon graft spans the distance between the little finger metacarpal and the adductor insertion in the proximal phalanx of the thumb. A long flexor tendon of the forearm (a sublimis or the palmaris longus prolonged by its strip of palmar fascia) is looped over its center to form the T. Thus when in action it changes to a Y, adducting the thumb. See Fig. 5.

### (4) PARALYSIS OF MEDIAN AND ULNAR NERVES

1. Ankylose the wrist in about 30° of dorsiflexion thus making available the wrist extensors.
2. For flexion of the fingers the extensor carpi radialis longus can be attached to the profundus tendons and extensor carpi radialis brevis to long flexor of the thumb.

### ROTATION OF THE THUMB

Rotation of the thumb so as to diametrically

oppose the fingers is the function of opposition (a thumb in true opposition is not only opposite the fingers but it is far forward from them and is rotated so that the pulp faces the fingers). Merely placing the thumb in contact with the fingers is not opposition.

With loop operations to restore ability to oppose the thumb, the two essential principles are:

1. the tendon should pull in the right direction, subcutaneously diagonally across the thenar eminence toward the pisiform bone to angulate the thumb forward and toward the palm.
2. The insertion of this tendon should be into the dorso-ulnar aspect of the base of the proximal phalanx, so as to rotate the thumb. See Fig. 6.

This may be accomplished by using any of the various muscles for motor power and for tendon either the extensor pollicis brevis tendon or any one of various tendons prolonged by tendon grafts. The tendon used is made to pull in the right direction either by passing it through a tendon pulley constructed at the pisiform bone or by passing it around the tendon of the flexor carpi ulnaris.

In conclusion: Each case is individual. Many will not fall into the above groups and the transfer plans are altered and additions made to supply the function needed according to what muscles are available. These transfer plans and further surgical details have been taken directly from *Surgery of the Hand* by Sterling Bunnell.

## REMEDIAL TREATMENT FOLLOWING SURGERY

The basis of treatment after tendon transplantations is built on the theory that intention movements, governed by the cortical centers, are performed in an over-all pattern (in which several regions of an organ participate), rather than a mere muscle contraction carrying out a motor function.<sup>2</sup> We draw our conclusions for reeducation treatment from this concept of normal structural pattern of action. However, under pathological conditions, in the earliest stages of reeducation, training of a single muscle is necessary in order to coordinate its new function with the motor pattern of the intention movement.

Emphasis in exercise therapy should be directed toward the desired movement, a rhythmic pattern of opposing muscle groups. Performance of function should be stressed rather than the strengthening of muscle contraction.

The principles of treatment as followed by Physical and Occupational Therapy<sup>2</sup> should include the following:

1. Exercises done slowly with frequent rest intervals.
2. The movement performed should be initiated without substitution.
3. First, increase movement passively and actively, and strength, last.
4. Develop speed.
5. Functional integration into the intention movements.
6. Lastly, work for functional integration of the newly acquired movements along with intention movements of the entire organ.

Just as soon as the patient has established correct working habits of the transplanted muscle without substitution, and there is no danger of performing movements which might cause harmful stretching of the transplanted muscle—this early post-operative treatment in Physical Therapy begins within 3 to 4 weeks after surgery—Occupational Therapy can be commenced a week to ten days later. Thus Occupational Therapy treatment in tendon transplants is concerned with a continued re-

education treatment with emphasis on coordination of the involved muscle and full functional adaptation into integral movements which will be achieved through repetitive intention movements—purposeful actions which are motivated in the performance of some task or in some sport or game. With a specific description as to the involved muscles of the transplant, Occupational Therapy can supply various modalities of work which will provide the desired movement in a normal, easy way.

## PHYSICAL EVALUATION

With a specific description as to the nature of the transplant, the Occupational Therapist can make a physical evaluation of the total hand disability. Here are a few suggestions that Bunnell gives as to the manner in which such an evaluation can be made.<sup>3</sup>

First, grade the function in the hand as to extreme limitation, moderate limitation or slight. This is purely an objective analysis based on your knowledge of how the hand is used in various types of work. You have to come to some conclusion as to the possible function present and how the patient can reasonably use it before you can draw up an objective of treatment. The size of the extremity gives you a good indication as to its use.

Complaint—Under this heading of present complaint, one should record in degree of importance what bothers the patient the most: pain, tenderness, limitation of motion or muscle weakness.

Is he able to work? If so, what kind of work does he do? Has he used his hand in any type of activity since his injury? How much use the hand is to him is of primary importance. Decide first in your own mind what possible function is present, outline a few suggestions as to how he can use his hand and then compare your conclusion with his. If he fails to realize just how much he can use his hand and in what way, then you have to approach the objective from the standpoint that exposure of the extremity to a variety of activities better integrates its use with his daily pursuits and better coordination will be established. Pro-

<sup>2</sup>Physical Therapy Review, Tausmer, Elizabeth, Reeducation of Transplanted Tendons, July and August, 1945.

<sup>3</sup>Bunnell, Sterling, *Surgery of the Hand*, 1944, Lippincott, pp 60-66.

iciency of function depends on skill, and skill is obtained through various active methods.

Function in the hand depends on the following conditions:

1. With the joints in a position of function, how strong is the grasp? If the metacarpal-phalangeal flexion is weak can the patient grasp large objects? In evaluating grasp, can the patient grasp one or two of your fingers strongly, weakly, or can he grasp three or four, strongly or weakly? Can he spread his fingers to grasp large objects? Wrist stabilization will effect grasp and should be so evaluated. Any limitation in dorsi-flexion will impede the strength of flexion and is considered in the activity planned. Also, whether the patient is right or left-handed is of extreme importance in determining grasp, thumb opposition, grasp between thumb and fingers, fingers and palm and grasp of large and small objects with strength, firmness and agility.
2. If a flat hand is present, will the patient be handicapped in pushing or pressing?
3. If opposition is impaired and the right hand is involved, what activities requiring opposition and of how intricate a nature can be performed?
4. Is the lack of extension in the metacarpal-phalangeal joint impairing the grasp of large objects or is it lack of extension of the interphalangeal and distal phalangeal joints?
5. In evaluating the thumb can the patient extend and abduct thus stabilizing the thumb for opponens action?

The hand is as functionally useful as the shoulder and elbow joints permit it a wide range of use. Examination of the hand includes the entire arm. The raising of the arm should be tested in the anteroposterior and lateral planes and internal and external rotation should be noted. At the elbow, limitation in extension and flexion and pronation and supination should be measured. Note in degrees, the dorsi, palmar, radial and ulnar flexion of the wrist. Goniometric measurements are taken and in recording movements one should specify whether it is voluntary or passive. Movements of the fingers as a whole should be recorded.

You could state that each finger lacks so many inches of full extension when measured at the tip. A plane surface is laid on the dorsum of the hand and measurement is taken from this plane. Also we can state that each finger lacks so many inches of flexing voluntarily to the distal crease in the palm.

Thumb measurements are made of limitation of extension, flexion, adduction and opposition. In extension, place the two hands palm to palm with the normal thumb voluntarily fully extended and bent backwards. Measure with a ruler how many inches the injured thumb lacks voluntarily and passively of reaching the plane of the extended normal thumb. In testing for flexion and adduction the normal thumb is made to reach as far as it can down the ulnar border of the hand. Measurements are taken in the injured hand of how far the thumb fails to reach this point.

Opposition is expressed in two measurements: one is the farthest distance forward from the hand the pulp of the thumb will reach when it is opposite the base of the long finger or the index finger. The other is the angle the nail makes with the palm when so doing. The nail should be parallel with the palm. The spread of the thumb can be expressed by how far the tip of the thumb spreads from the radial border of the palm or index finger.

The spread of the hand can be measured by placing the two palms together and comparing the spread of the normal with the injured.

Measurements of voluntary and passive flexion and extension of each joint of the fingers and thumb are taken with a small goniometer.

Modalities of treatment for tendon transplants include the entire scope of activities which can be analyzed and grouped according to the specific function needed. However, before such an analysis is outlined, it should be emphasized that all constructive work has in common certain functional principles, the extent to which the function is employed varies, but though the resistance may be light very often the element of time makes up for the loss of resistance. A man's employment of his mind with interest in an avocational work aids more in an unconscious reeducational manner than concentrated work of maximum function.

Man's hands are his tools and in every interest he is given an opportunity to use his hands; thus Occupational Therapy offers a curriculum of interests which gives the patient the opportunity to develop his own program of therapy. The benefits derived will be in proportion to the patient's participation in these various activities.

We have only commenced to explore the possibilities of function in our various fields. In photography, for instance, various simple natural operations tend to automatically re-educate and strengthen the hand so that it may be used with a fair degree of efficiency. The adjustment of the lens of the enlarger, picking up paper and placing it for printing requires the use of both hands, one to work the machine and the other to adjust the paper. The developing and washing of negatives and prints uses the hands and the arms in a free swinging motion from the shoulders. The use of the contact printer requires bilateral light grasp, one of the easiest and most natural means of beginning reeducation in the establishment of a habit pattern of use. The man with an opponens transplant would unconsciously begin active use of the thumb in the above operations. This is just a beginning and it is cited as an example to illustrate the point that in many different ways we find expressions of function which add color and interest to the therapy, making it all the more effective because the patient unconsciously rebuilds again the habit of use and employs his hands in a natural way. His efforts are directed toward a purposeful performance, the expenditure of energy being directed toward accomplishment of a task, not an end in itself but as a means to an end. Therefore, he who employs the natural use of the hands in creative skills, skills which developed man's dexterity in the use of his hands through centuries of handwork, will regain the natural agility much faster because he is using them in a manner for which they were designed.

The hand is dependent on the functional movement in the shoulder. Free easy motions of the entire arm will provide him the opportunity to use his hand in many more ways and thus strengthen the hand in proportion to the variety of uses it is put to.

For shoulder work, mild activities can be given such as mechanical drawing, where the arm is supported giving exercise with the factor of gravity eliminated. Photography offers many possibilities for frequency of shoulder flexion and abduction exercise. Small loom weaving, upright frames for various forms of weaving, all forms of knotting, fly tying and a variety of light activities where the work is placed farther away, even with the arms supported on the table, will provide mild exercise of the shoulder muscles to support the weight of the arms in reaching forward to work with the hands.

Of moderate intensity are such activities as woodwork with power machines. In a multitude of movements, the hands work away from the body, raised almost to shoulder level. Machine shop work and plastic afford excellent therapeutic uses for shoulder routine exercises. Silk screening with the use of the squeegee is almost completely a shoulder activity. Floor looms are the old stand-bys for this function.

Then for intense involvement of the shoulder muscles, we have machine operations such as the printing press and woodwork processes, the jointer, planer and drill press.

There are other possibilities of gaining function in the shoulder. Games have limitless possibilities, household tasks, painting, refinishing processes, and a multitude of other expressions of function are there if we look for them. Watch a man at work, his body movements will be surprisingly varied and complete, no matter how small the task is that he is doing. We have only to injure and lose even a very small function to realize how much we take for granted and how much we rely on the smooth coordination and fine mechanical performance of all of our body. To restore as much as possible the ability to perform tasks with ease and mechanical skill is our goal in therapy. Man must not lose his interest in constructive creative work because he has lost the function of his hands.

Now, with the elbow, activities that we mentioned for the shoulder will provide a good range of movement. Metal work, leather lacing, carving and mallet work, wood chisel work, wood finishing processes, sawing, filing and numerous processes provide graded work



for the elbow.

We hear a lot about graded activities in Occupational Therapy: grade the resistance, grade the tools, size and weight, and grade the time. The problem is made easier if we remember one important principle in Occupational Therapy. As modalities of heat, light, massage and heavy resistance are to the physical therapist, so to the occupational therapist is the importance of the selection of the many different modalities. Keep foremost in mind not the grading of resistance so much, but the grading of use. Do not expect a functional performance on too difficult a nature. Give the patient something first that will make him use his hand just a little and for a short time. Then see that with each activity planned and engaged in that he uses his hand just a little bit more. Your aim is maximum use, and use in a variety of ways from simple to intricate.

For wrist function in tendon transplants we are particularly concerned. Flexors are transplanted to the wrist extensors. When the pattern of function has been established and the patient can extend his wrist by using his newly transplanted flexor muscles, work should be given him of a light nature where he has to support the wrist in a position of function at an angle of 45° with the forearm while he uses at the same time his finger flexors to hold or grasp a tool. Mechanical drawing, pastel work, light painting, right-hand activities, leather tooling requires use of the wrist in a stabilized extended position. Writing, typing, fly tying, leather lacing and small loom shuttle work also are performed in this position. The important principle to remember here is not to give any work that might induce the opposite movement in a strong manner so that the newly transplanted muscles would be stretched. For instance adapted mallet work requires good extension of the wrist but at the same time if the elbow and shoulders are kept from moving and the mallet is light enough, the wrist will flex with the descending blow and in the early stages post-operatively might cause stretching of the newly transplanted muscles.

When enough time has elapsed (eight to ten weeks after the transplant) metal work and woodwork or heavier mallet work which would exercise the wrist in both flexion and

extension can be given. Strong grasp with the wrist dorsi-flexed should be the objective. A strong grasp requires strong wrist stabilizers. Also the finger flexors need considerable strengthening because they will have to take over the function of flexing the wrist. Ceramics is another field for functional use of the hands and wrists that has many different possibilities because the hand is used in every function and the wrist movements are frequently employed. There is a continuous flow of movement, grasp and release, opening and closing the hand which gives such an excellent expression for function. In ceramics as in other types of work, normally the patient is continuously dropping and laying aside his tool, changing his position, using another tool or varying his work in some way so that he unconsciously employs the therapy of rest and alternation of activities which use muscles in their normal agonist and antagonist roles.

In the hand, the intrinsic function can be strengthened further by a variety of activities just as soon as the motion desired by the new transplant can be initiated. Extension of the fingers (extension that involves the metacarpal phalangeal joints, the long common extensor action), can be obtained in large grasp or in grasp that involves stabilization of the metacarpal phalangeal joints while the interphalangeal and distal phalangeal joints strongly flex. Grasp of built-up handles in this manner can be used. Grasp of large handles in woodwork, plastic, printing and with the loom use the stabilization action of the extensors across the metacarpal phalangeal joint. Finger extension, use of the long extensors and intrinsic has to be achieved primarily in alternation along with finger flexion.

Stabilization of the fingers at the proximal joint by the long extensors so the distal flexors can work is utilized in small grasp such as in converging flexion of the fingers to pick up fairly small objects as printer's type or in fly tying. In typing and playing the piano finger extension is complete, especially in reaching with the fingers in abduction.

Complete extension of the interphalangeal and distal phalangeal joints involves the intrinsic while the metacarpal-phalangeal joint is braced in extension. With loss of this func-

tion of the lumbricales and interossei in median and ulnar nerve paralysis the sublimis transfer may be used to provide finger extension. Small grasp with frequent release of grasp will begin utilizing the extensor action of the interphalangeal and distal phalangeal joints. Assembly work, model building, fly tying, all demonstrate intricate coordinated hand function with grasp and release for which centuries of handicraft have developed the skilled use of the hand as a manual tool. Power machines offer function for the fingers in extension because so frequently the hand is used in a bracing pushing action which utilizes extensor action.

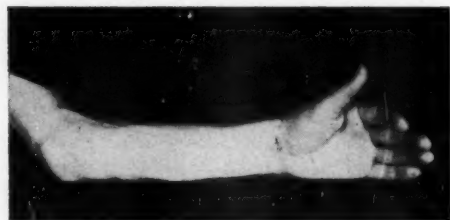


Fig. 7. April 30, 1947—Before treatment: Active extension and abduction of thumb.

For transplants to the flexors of the fingers we would work for strengthening grasp with graded ranges, progressing as the hand closes more completely in flexion. With increasing strength, heavier work can be given and over longer periods of time.

For thumb extension we can take advantage of the pincer action of adduction in the thumb in which the proximal joint of the thumb is flexed and the distal joint is extended strongly. This principle of function can be obtained with leather stamping tools. The long extensor action of the thumb working in conjunction with the adductor will strongly function to hold a small tool. This action is often substituted for lack of opposition in the thumb. It must be emphasized that in opposition of the thumb to the index finger it is rolled around and stabilized more in abduction.

In beginning opposition function if there is sufficient thumb web to allow abduction of the thumb, we can get opposition by stressing rolling the thumb around an object in grasp. Closing the hand and wrapping the thumb around the fist gives some thumb opposition.

Wood carving employs this function.

More specifically as the face of the thumb begins to oppose the converging finger tips we can use leatherlacing, leather tooling, mechanical drawing, fly tying and knotting. With loop transplants, in beginning reeducation for thumb opposition use of the hands with typing, beginning the operation with both thumbs rolling down to strike the shift bar teaches the new transplanted muscle the specific rolling action at the same time the good thumb performs the function desired to operate the shift bar.

At Percy Jones General Hospital the Army has successfully used this particular loop operation for thumb opposition in many instances. Radial transplants were also very effective. Here is a summary of such a case history of a patient.

The patient was wounded in action, on enemy territory, March 1945, sustaining fracture, compound, comminuted, proximal third of left radius and ulna with resultant radial nerve injury, causing partial paralysis. A



Fig. 8. April 30, 1947—Before treatment: Active opposition and flexion.

bone graft and a neurorrhaphy were performed April 1946. In April 1947 a tendon transplant to the thumb was done, to give extension and abduction. The flexor carpi radialis was transferred to the abductor pollicis longus and brevis and to the extensor pollicis longus and brevis, then sutured.

Physical therapy was started on this patient three weeks post-operatively, at which time the regime consisted of whirlpool, mild active and passive exercise, and reeducation to the thumb.

Occupational therapy followed physical therapy in one week. Examination and physical findings revealed: hyperextension of the wrist (due to the cock-up splint), a slight edema, pain, and limitation of motion in all ranges.

Light exercise on a loom was begun the first week, stressing use of the shuttle for alternate extension-abduction and flexion-opposition. The time gradually increased each day and the size of the shuttle changed. Weaving was carried out until strength and tolerance permitted use of heavier equipment. The patient's interest in machines and tools facilitated use of his hand normally, stressing grasp and opposition, opening and closing his hand in the use of his tools. In this way he was not stretching



*Fig. 9. After one month of treatment: Complete extension and abduction gained.*

the transplanted tendon but alternately exercising both agonist and antagonist. With emphasis laid on strengthening grasp, the wrist extensors gained in strength proportionately. With different sized and shaped tool handles the patient was shown several ways of grasping: one with the thumb curled around in opposition to his clenched fingers and the other method of rotating the thumb in opposition but stabilizing it in extension and running it as a guide along the handle surface.

Opposition with the thumb describing a circle with some extension and abduction-stabilization was stressed in picking up objects or in pincer-like action in pulling leather lacing and in tooling. Bracing the thumb in extension and abduction and at the same time rolling in down and around the edge of a small piece was demonstrated in band saw work and in sanding. This last functional activity was particularly suited to the supportive use of the

AJOT I, 6, 1947



*Fig. 10. After one month of treatment: Complete flexion and opposition gained.*

left hand in bracing, guiding and steadying the material. When the patient could use the thumb in very light scissors work definite progress was made.

The range of motion in his wrist increased to  $35^{\circ}$  after two weeks work. Opposition, grasp, extension and abduction were almost



*Fig. 11 After one month of treatment: Grasp.*

normal upon discharge. Measurement of patient's grip showed 35 pounds.

Before treatment, active extension and abduction of the thumb was measured and pictures taken. See Fig. 7. Active opposition and flexion is shown in Fig. 8. After one month of treatment, the improvement in extension,

abduction, opposition and flexion and grasp is shown in Figs. 9, 10, 11.

In selecting modalities the chart (Fig. 12) is of value to the patient. His selection may be limited to a specific category in which the function desired is present. This can be pointed out to him and with an explanation of the possibilities of function present.

Our treatment record of progress should include, in addition to a measurement of increased range of motion, a summary of the practical use of the hand. It should describe the position of function, the spread of the thumb and the fingers to reach around an object, the size of objects that can be grasped and the actual use of the hand. Pictures illustrate this very clearly. The summary could state that the hand has improved to include holding a wrench, using a hammer, or holding a pencil firmly between the thumb and fingers. He should continue similar light work at home.

A patient returning to work improves immediately both in morale and in use of the hand. There is a natural response to the use of the part which is unknown in any other type of therapy in these hand cases. Light work should be provided these long-crippled hands which will need gradual work on easier jobs. Therapy should begin on the wards. Until the tissues are ready for regular work the hand at first is lame, weak and awkward. Gradually,

with use it becomes adept. We cannot rely completely on Occupational Therapy to make a man exercise his hands, but it should be a development, an objective result of his exercise routine.

There is a great deal of function in work that has to be performed every day, but in this present age of labor-saving devices, those tasks that require physical exercise are cut to the minimum and they are not enough to restore function. Restoration of function has to be emphasized with supplemented activities in a variety of ways while the man is still hospitalized. Pure exercise should be taught and then the man should be given the opportunity in shop work, in games and in recreation to express his function.

#### BIBLIOGRAPHY

1. Bunnell, Sterling, *Surgery of the Hand*, 1944, Lippincott, pp. 60-66, 293-298, 371-374.
2. Physical Therapy Review, Tausmer, Elizabeth, *Re-education of Transplanted Tendons*, July and August, 1945.
3. Carpenter, A. R. Tendon Transplantation; end result study of 458 transplantations, *Jour. Bone and Joint Surg.*; 21 921-932, Oct., 1939.
4. Horgan, E. Nerve suture and muscle repair; primary suture of ulnar nerve and secondary reconstruction of extensor tendons of the forearm, *Ann. Surg.*; 95; 93-100, Jan., 1932.
5. Steindler, A. Tendon transplantation in upper extremity, *Amer. Jour. Surg.*; 44: 534, June, 1939.

## Considerations for Prevention of Blindness and Conservation of Vision

By EVELYN M. CARPENTER, *Director, Philadelphia Committee for the Prevention of Blindness, Professional Building, Philadelphia, Pa.*

Until recently, according to our history of medicine, the doctor was called in to act as a last resort. Persistent tragic results pointed up the need for an earlier, closer and more constant relationship between the doctor and ill persons, for a wider knowledge of the cause of disease, treatment broader than dosage. Through considerations of these problems two new services were conceived. To define them, the terms Public Health and Preventive Medicine were coined. They are in common usage today and they are widely understood.

Efforts to bring to individuals an awareness to symptoms in a broad sense, the significance of little fevers and small pains, and the need to treat with them promptly have grown and developed into agencies from national status down to the local community.

During the evolutionary period of Public Health there was noted a tendency to isolationism and it may have persisted longer had not the forces of organized Social Work become so impelling, so essentially a part of the whole treatment program. But little by little, through



calm, efficient demonstration, personal and social maladjustment problems have come to be recognized as influencing factors in any overall plan to sustain a healthy, steady people. The pooling of services has not stopped with those two powerful organized forces. Coordination goes on and on through all the categorical "Welfare" services, through schools, churches, clubs. Day by day it becomes more obvious and more pressing that the specific contributions of all are required if the individual who is actively or potentially sick and illadjusted is to be stimulated to want and to seek maximum benefits from the healing arts of medicine and social science.

Through this general introduction it is my thought to relate the movement for prevention of blindness to all other ramifications of public health and social work and to bespeak for it a place in the consideration of individuals regardless of the service category in which their needs may fall. For better than a century the major concern of government and private philanthropy, with regard to blindness, has been the care and education of blind persons. It is highly probable that, in this country at least, there is a more productive sentiment and sympathy for the blind than exists for persons with any other disability. Because it is generally believed that blindness is the most difficult handicap to overcome, subsidies and services of all sorts have been set up to compensate in one way or another for the loss of the priceless gift of sight.

Could they know that blindness is not a God sent affliction but the result of many constitutional diseases, broken health laws, ignorance of the significance of little fevers and small pains, blind persons everywhere would probably demand not a paltry compensation for loss but full protection against any threat to their God-given right.

Carl Siegmund Franz Crede, obstetrician to the Maternity Hospital of the University of Leipzig, was first to recognize and to meet the need for a preventive as well as treatment for the blinding disease, ophthalmia neonatorum, more commonly known as babies' sore eyes. He tried and proved the efficacy of silver nitrate dropped in the eyes of infants immediately after birth but it is astonishing how

slowly an important demonstrated fact is accepted and acted upon by the world at large.

It was better than thirty years after the Crede method was discovered that Louisa Lee Schuyler, a lay person, was introduced to a nursery where little children blinded by ophthalmia neonatorum groped their unsteady way with only outstretched hands to guide them. She was profoundly moved by the sight and when she learned that proper treatment at birth would have kept the eyes of those children seeing, she set about the noble task of informing the public of that tragic evidence of carelessness and ignorance. Her efforts resulted in the first organized movement for the prevention of blindness. Since then, in nearly all states, laws or mandatory rulings have been enacted which require doctors and midwives to use the Crede method of treating the eyes of every baby they deliver.

Few women today have not heard of the sight saving "drops." Few workers in the area of prevention of blindness can forget the years of struggle and discouragement, the eyes which were needlessly sacrificed before ignorance and resistance to law gave way to enlightenment and cooperation.

Sight may be threatened at any period of life from conception to old age, but unlike a given disease which has a specific cause, impaired vision or blindness has many causes.

The eye is an integral part of the body, influenced by its functions and subject to its disorders. Blood travels through vessels in the delicate parts of the eye as it follows the course of circulation. Infections or deficiencies within the blood stream may be found in the eye as well as in any other part of the body which the blood supplies. The retina, sensitive camera-like plate which receives impressions of images, is tissue identical to brain tissue. The two optic nerves on which the eyes are borne stem from the brain. It follows then that disturbance within the brain may be expected to extend to the eyes and vice versa. Visual impairment or loss may also influence mental reactions and often are a dominant factor in unstable behavior. The intimate relationship between the eyes and the parent body should dispel any thought that the end of all eye treatment is glasses. It should establish the impor-



tance of studying the status of eye health along with all general physical examinations and in the consideration and treatment of personality problems.

Added to the causes of blindness as they are related to systemic diseases and accidents, which are legion, there are some which seem to be confined to the eye alone so the planning and administration of measures for preventing blindness becomes a problem too complex for solution by any single service or agency. It is the responsibility of all.

Syphilis takes a heavy toll in sight beginning with congenital malformations for which medical science has no cure. An acute inflammatory condition known as interstitial keratitis, nearly always caused by congenital syphilis, attacks early in the first years and often clouds the corneas densely before the mother has thought beyond the possibility of "Pink Eye" and remedies suggested by sympathetic neighbors. A little later on in life other parts of the eye may become involved and we review the records of iritis, choroiditis, retinitis, iridocyclitis, all meaning inflammation of those designated parts; all serious and often blinding.

Let us explore the categories of service which come into the treatment picture when the individual with damaged eyes decides to seek medical care. The *eye doctor* first, who needs tests and calls upon the *laboratory* to establish the source and cause of the trouble. Then if the condition is systemic, the *clinic* or *specialist* to treat, the *nurse* or/and *social worker* to follow through with the patient until the disease is arrested or cured.

Should the eyes be damaged, as is frequently the case, the problem of suitable education has to be met. For those who have lost all sight, *schools for the blind* constitute an essential service. Public sympathy and generosity have not provided as well for those who are partially seeing but wherever *Sight Saving Classes* have been established they provide a resource which is pressed into service. The adult presents the further problem of rehabilitation which entails training for profession, trade or craft within the limits of his capabilities. This requires other departments of service—the *rehabilitation agency*, *aptitude tests*, *occupational therapy*, *special work shops*. Usually a gainful

occupation has to be found and the *employment agency* is called in. If a subsidy is needed *public assistance* and supervision provide another important service.

The case might resolve itself into one of frustration which would indicate the advice of a psychiatrist and at that point would begin the tracing back to early symptoms—back to the first significance of the "Pink Eye" which was not recognized by family, by neighbor, by teacher, by nurse or by any public servant who may have held for a moment the blessed opportunity of safeguarding the sight and future well being of a child.

Another frequent and vicious sight destroyer is glaucoma. Its cause has not been discovered. No means of prevention can be predicted. The best hope lies in the understanding of early symptoms translated into early and everlasting treatment.

It is enough to discuss two types of glaucoma—acute congestive and chronic simple. Acute congestive glaucoma is accompanied by excruciating pain, usually in one eye. The eye becomes red and the cornea is steamy, vision bedims. After twenty-four to forty-eight hours it lessens or ceases completely but vision remains foggy. It never clears. The second attack may cause blindness and surgery to relieve pain usually is indicated. Prognosis is bad in such cases.

Chronic simple glaucoma invades the eye quietly. There is little or no pain—possibly a dull ache which is rarely associated with the eyes. There is no perceptible loss of vision. Coming as it often does in middle life when "reading glasses" are a necessity, the presence of glaucoma is often disguised as a "poor refraction" or "I've never been able to do close work," colored rings around lights have no significance. It is not uncommon to find persons nearly blind in one eye and well advanced glaucoma in the other before an ophthalmologist has an opportunity to prescribe treatment. Prognosis in these cases is only fair. Vision lost can never be regained and glaucoma, like any other disease that has become deeply entrenched, is difficult to control. Blindness is inevitable. Discovered early, treated adequately and always, glaucoma presents a hopeful outlook for useful vision throughout life.

Accidents occupy front ranks as a cause of blindness. American Industry alone loses \$50,000,000 yearly because of injuries from preventable accidents. There is no estimate of the individuals loss. Safety programs developed over the years have brought about many devices to protect workers from all types of bodily injuries. But to make them wholly effective the individual must understand and use them to full capacity. Responsibility for his education in this area cannot be shifted entirely to Safety Engineers nor to the owners of the plant where he works. It is basic to his education for living—it should begin in kindergarten and carry through every teaching medium of the community and for all time.

Blinding injuries to eyes are not confined to labor and industry. They can occur in the nursery or on the playground. After they have happened it can be seen clearly how they might have been prevented. Scissors and knitting left within reach of busy little hands, jack-knives and B.B. guns in larger but no more competent hands. Countless ways there are to cause a penetrating wound in one eye—fewer to prevent total blindness from them. The individual or his parents must know that every penetrating wound of the eye should be regarded in the light of total blindness until a competent ophthalmologist proves the contrary. The individual or his parents must feel the responsibility of carrying through to the letter the doctor's recommendations for treatment if a little puncture wound today is not to become the blinding condition tomorrow.

Venereal diseases, glaucoma and accidents are only a few causes of blindness but they constitute the prime menaces to sight. They are nearly all preventable. The degree to which they will be controlled in the future depends upon the extent, the character and quality of combat directed against them.

Personal responsibility and personal initiative are the most constructive forces in any pioneer endeavor. Prevention of blindness as a part of public health and social work is still in a pioneer stage. Frontiers have been pushed back measurably in the area of ophthalmia neonatorum where personal awareness and in-

itiative rallied the nation's support in defense of infants. If other specific sight destroyers are to be as effectively controlled blindness must be accepted as disease in its broadest interpretation. It must be classified with tuberculosis, other communicable diseases, cancer, rheumatic fever so that students of public health, social work in its several departments and occupational therapy, will have adequate instruction in the early identifying symptoms of all. Understanding brings awareness and awareness engenders action. Action spreads to the individual who in turn learns to recognize the significance of little troubles and to seek for them medical care before they become entrenched as stubborn disease.

Despite all that has been accomplished by the persistent efforts of many professional and lay groups, greater activity among more agencies is needed to bring the basic principles of prevention to the individual citizen and to the majority of parents who remain ignorant of the commonplace factors which influence most the lives and health of their children.

The Occupational Therapist has a responsibility commensurate with her contacts with people. Should she work with a patient in his home she has an opportunity to know members of his family—neighbors possibly—all anxious to relate their own experiences, often their needs and problems. The worker whose training has included elements of case finding may be the one enlightened person who has had contact with that home. The highly specialized service she has to render may be doubly effective if she can point the way to easement of pressures on other members of the family.

The infant with swelling and redness of the eyelids may be the one to benefit by prompt action stimulated by the Occupational Therapist. The "Pink Eye," too, which proved to be congenital syphilis—the injured eye which looked as though home remedies would cure it—the colored rings around lights at night—all are tragedies in disguise; all symptoms to be identified in their true light and freed from their menacing implications.

Is it your responsibility? The answer is—Yes.

## Curare and Its Effect on Rheumatoid Arthritis

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Curare, which is a combination of crude extracts from South American plants, was originally used by the aborigines of that continent on arrow tips when hunting small game and birds. When hit by these curare-tipped arrows the prey would become paralyzed.

This extremely dangerous substance was experimented with by the medical profession, up until a few years ago, in pharmacologic research. In 1935 R. E. King isolated a crystalline, highly active, quaternary base chloride from tube curare to which he applied the name d-tubocurarine chloride. The clinical use of curare is based on its "ability to create a transient block to neuromuscular transmission." With this in mind experimentation has continued and it is now administered to patients rather successfully in the following medical fields: anesthesia, convulsive shock therapy, poliomyelitis, and just recently in the field of arthritis. It is the latter diagnosis which the reporter wishes to discuss in relation to the use of curare. But first a short description of its application to the other above mentioned fields.

In the field of anesthesia curare is used because of its ability to cause complete relaxation of the gut. It can be given only in conjunction with inhalation anesthesia. The head and neck muscles are affected first and then the muscles of the extremities, abdomen, those of respiration and finally the diaphragm. When given intravenously relaxation occurs within two minutes, but when administered intramuscularly its effect does not occur for approximately fifteen minutes. With both types of administration the effect lasts about twenty minutes. If an over-dose is given respiratory paralysis results and artificial respiration must be applied.

The dangers of convulsive shock therapy are lessened to a great extent by the use of curare as it prevents skeletal and some visceral in-

juries. Rigidity is greatly reduced and the violent clonic spasm characteristic of shock therapy is absent or markedly reduced when an aqueous solution of curare is given intravenously.

Curare is being used in the acute stage of acute anterior poliomyelitis. The reason behind its use is based on two facts: there is muscle spasm in this stage and spasm is harmful to the muscles involved. It would therefore seem important to eliminate or at least reduce this muscle spasm. With this spasm relieved, physical and occupational therapy may be initiated much sooner, and more efficiently than previously.

Dr. Charles Ragan and Dr. Edward B. Schlesinger were the first men to use curare as a relief of muscle spasm due to arthritis. In a paper published in the December, 1946, issue of *The American Journal of Medicine* they reported that with the small group of early rheumatoid arthritics with whom they had worked muscle spasm was decreased, thus preventing deformities and relieving the usual arthritic pain.

Under the direction of Dr. J. Sydney Stillman, Chief of the Medical Staff, curare is now being experimented with at the Robert Breck Brigham Hospital in early acute rheumatoid arthritis where there is no significant joint damage or fibrous changes. As there have not been a sufficient number of cases treated to draw any positive conclusions concerning the use of curare at this hospital, this will be merely a summary of its purpose, type of patient to be treated, administration, and proposed occupational therapy techniques.

The purpose is to relieve muscle spasm present in rheumatoid arthritis in the above mentioned stage. If spasm is decreased flexion deformities will be lessened. As you are probably

aware the main problem with which the medical profession is confronted when a diagnosis of rheumatoid arthritis is made is the prevention of deformity or correction of existing deformities. So far there is no known cure for this disease, therefore it is primarily a task of "making the best of what you have."

The administration and contraindications of this procedure are numerous and extreme care must be taken in its use. The curare or d-tubocurarine chloride is absorbed very rapidly when given in an aqueous solution, but when injected intramuscularly in a mixture of oil and wax the absorption rate is slowed down and a more constant level of the drug maintained. The injection is most often administered intramuscularly in the gluteal region. The first injections consists of .7 c.c. of curare. The 1 c.c. is given every other day for 2 or 3 days until the optimum effect is obtained. From then on injections are given every three or four days. If any abnormal symptoms appear following any injection the curare is stopped immediately. Curare creates a myoneural block and when given in oil and wax it is possible to create a partial block at the myoneural junction which tends to eliminate muscle spasm, but does not cause loss of voluntary motion. When administered in an aqueous solution a complete block is more apt to occur because of its rapid absorption. Because of its rapid excretion and detoxification d-tubocurarine in aqueous solution does not remain in the body a sufficient period to be useful therapeutically. If an overdose of d-tubocurarine chloride is given the following symptoms may appear: fuzziness of vision, increased aural sensitivity to low notes, feeling of warmth in the extremities, double vision, frontal headache and dizziness. An extreme overdose or sensitivity on the part of the patient will result in changes associated with the autonomic nervous system or with asphyxia or respiratory paralysis. Patients who are allergic to peanut oil, suffering from respiratory deficiencies, pulmonary disorders, or renal or liver dysfunction are not treated with this substance.

Prior to the first injection accurate joint measurements are taken so that increase in motion may be noted. At the Robert B. Brigham Hospital the Occupational Therapy Department

is responsible for the recording of all joint measurements. On the first three days following the injections measurements are done twice daily and henceforth once a day. If rapid increase is noted measurements may be necessary twice daily, but usually after the first two weeks of daily measurements these recordings weekly will be sufficient.

The usual program of treatment is carried on during this procedure with the exception that physical and occupational therapy may be initiated earlier than in non-curare treated patients. A graded treatment program is begun in occupational therapy with active non-weight bearing motion progressing to active weight bearing and on to resistive exercise. Perhaps you are asking: Is not muscle spasm set up by the body to protect a joint? If so will not the joint be damaged if exercised when spasm is eliminated? To the first question the answer is most assuredly in the affirmative, but, to the second question the answer is: an arthritic joint should be exercised, but only with careful supervision so that no damage will occur. If the joint remains immobile fusion of the joint and severe muscle atrophy will be the ultimate result. A strict and carefully graded treatment program must be carried on with all arthritic patients but particularly with those receiving curare. Except for the fact that spasm is eliminated in arthritic patients treated with curare the same rules which apply to other orthopedic occupational therapy programs are carried out in these cases.

As was stated earlier in this article there has not been sufficient work done with curare in the field of arthritis to reach any positive conclusions, but from the clinical results observed to date further exploration seems warranted.

#### BIBLIOGRAPHY

1. Schlesinger, Edward B., Recent Advances in the Use of Curare in Clinical Practice, Reprint from Bulletin of New York Academy of Medicine, Vol. 22, No. 10 (October) 1946.
2. Squibb, E. R. and Sons, Curare-Intocostarin, 1946, New York, New York.
3. Schlesinger, Edward B., Curare: The American Journal of Medicine, Vol. 1, No. 5, Nov., 1946.
4. Schlesinger, Edward B., M.D. and Ragan, Charles, M.D. "Muscle Spasm" In Acute Low Back Pain and Similar Syndromes, The American Journal of Medicine, Vol., No. 6, Dec., 1946.



# The Hospital Librarian Speaks to the Occupational Therapist

By HELEN BECKER, *Hospital Librarian*  
*Glen Dale Sanatorium, Glen Dale, Maryland*

Rehabilitation work in a hospital infers, in the caption sense, the challenging and difficult task of the restoration of the patient in all possible ways, his mental and emotional readjustments as well as his physical rehabilitation.

The hospital librarian has a definite contribution to make in stimulating new interests and at the same time bring about mental and physical relaxation.

The ultimate value of a book lies in what it can mean to the person who reads it. That value varies with the individual. If satisfactory library work is to be done, a sympathetic understanding of each patient is as necessary as is the knowledge of what the individual books can give and might accomplish.

The hospital librarian can contribute to the health education of the patient, both physical and emotional, through self-study by the patient making use of books approved by the hospital physicians. While proselyting should always be avoided, she can cooperate with the chaplains in providing religious reading matter. Religion can often mean more to the patient in the hospital than it ever did before. Hobbies of all kinds can be fostered by library reading. Inviting books, easy to read, can be had about astronomy, nature study, bird study, stamp collecting and other hobbies in which the patient can indulge without physical strain or harm. Cultural appreciation and participation find expression through reading courses on literature, history, travel and art and music appreciation. Material can be supplied by the library helpful to patients doing original work in writing and painting. Interest can be fostered in social problems, community interests and international affairs, if the patient is well enough to take an interest in them, and the curiosity aroused about them can be satisfied through library books, magazines and pamphlets. Race relations are of primary interest to the colored people who also enjoy books about the achievements of people of their race.

Young people, housewives, white collar workers, high school graduates, college graduates and others with very limited educational advantages can all make use of the hospital library. So can patients who are professional men and women such as doctors, lawyers, teachers and social workers. Material can also be had of interest to engineers, artists and workers in differing trades. Hospitals often include quite a number of foreign-born patients whose interests ought not to be neglected. While there are not enough satisfactory books for "adult beginners" there are many attractive children's and young people's books which can be used for them.

It is too frequently thought that "anyone" can do hospital library work and that all that is necessary for it is a collection of books whose selection and use can be left to any well-intentioned person or group of people. The ineptness in such a set-up is not nearly as obvious as are the results of inadequate occupational therapy programs. I know that in some tuberculosis sanatoria, as well as in sanitariums and psychiatric hospitals, the hospital library work falls into the hands of the occupational therapist when no trained librarian is available. We need to stress the full scope of well-staffed hospital libraries, and the hope that occupational therapists will work for their developments and will be able to cooperate with their programs wherever they are well established. I realize that some occupational therapists are naturally gifted with "book-sense," have widely diversified interests, and also possess the capacity for sympathetic understanding of many differing kinds of people. All these seem to me among the major requirements for a hospital librarian.

There can be as many types of hospital library work as there are different kinds of hospitals supplying different needs. The requirements in the work vary according to the type of patient program in each of them.



In a hospital for mental cases, among the many categories into which patients can be divided are two large groups: (a) those patients who are not seriously mentally ill, but who, for various reasons, think that they are, and (b) those who are, but, because of the nature of their illness, are unaware of it. The patients in the first group should be encouraged to face reality and to exercise their own initiative and judgment just as far as therapy indicates. The patients in the second group should have definite prescriptions of reading matter within their understanding, made for them under the supervision or by the direction of a psychiatrist. Psycho-neurotic patients require a different kind of handling from those with some definite psychosis. The way each separate case is handled should vary with each individual and his own specific needs. From long experience, I believe that elementary books on popular psychology and psycho-therapy are not generally as useful in therapy for the self use of psycho-neurotic patients as are those books which awaken or deepen wholesome interests of a more objective character. The patient more frequently needs to have his attention diverted from himself than he needs to have it concentrated on himself and his own interests. All hospital existence has in it the danger of creating or increasing in the patient self-centeredness and self-concern.

In a sanatorium for tuberculous patients conditions differ greatly from those in a psychiatric hospital. What is shared in common is that, for the most part, both groups are enclosed within four walls and that all are patients. In a sanatorium for tuberculous patients, hospital library work can be part of the work of a rehabilitation team. If, due to pressure, lack of equipment and specialized training, a highly professional program of skilled general rehabilitation is not possible in the sanatorium, the hospital library can still make a helpful contribution to what might be called "conservation." When a patient comes to the hospital, he is uprooted for an indefinite period from almost all that mattered most to him in his previous life. He is detached from his home, his family, his social affiliations and his work and often from the opportunity to be financially independent. He has no longer

freedom to come and go. Out in the world he has, nominally at least, enjoyed the privileges of "life, liberty and the pursuit of happiness." Now, in almost every aspect of his life, he surrenders its control into the hands of others. That is necessary for his cure. He is dependent now on professional care, yet he still remains a human being, and if rational, it is still what he desires to be. With his hospitalization, and his loss of health, he inevitably suffers a loss of security and is often victimized by an unnecessary sense of shame. A necessary emphasis is laid on protecting the community from his disease but unfortunately no equal stress is made on conserving his life and attributes as a potential contribution to the community, whether that community be the hospital or the world outside. He has need to be treated with respect for his person so that even in the hospital he can keep that balance between freedom and responsibility which makes all sane social living possible. In this the library has a definite part. A great librarian once defined the main purpose of a public library as "the development of individuality through a free exercise of choice from a leavened and prepared choice of books offered to the reader." If that opportunity be given in a hospital for chronic tuberculous patients, it can add greatly to the possibility of their remaining human while in the institution. It is only necessary to recognize what books are to see the possibilities. Here are black marks on a white page, only that, but by some alchemy in human nature, important to conserve, those pages can, through the power of the patients' imagination, break down the walls of a hospital room and enable them to travel all over the world, to meet and converse with the most interesting people and to live in imagination a life of even greater possibilities than their outside lives had afforded. To be sure, it is all a substitute living but material in it can be woven into the fabric of the patients' own lives and become an important part of them. Although patients vary in their background, native ability, and in what they can, individually, get from books, the lives and experience of almost every one of them can be enlarged by reading. Even if the books most enjoyed seem "tripe" to others, to the reader they can

represent a genuine enlargement of experience.

The fact, too, that one is free to read what he desires from the collection, provided the books would not be parently harmful, can give that sense of freedom and self-respect so essential to his well-being. The hospital librarian, together with the occupational therapist, can do a great deal to mitigate and circumvent the tragedy of frustration. There is a challenge to the librarian to give deference to the individual and to respect his choice of books even though that choice must be limited by wholesome library standards. Self-education is promoted most effectively by this attitude. There is no limit to what patients might accomplish through reading courses in history, travel, biography, the social sciences, psychology, philosophy, etc., undertaken on their own initiative when suggested to them by the librarian. It is a form of education that can be enjoyed by the patient even when he is physically unable to receive instruction from a teacher, because in his library reading he has no definite assignment to do and he can take up or lay down the books whenever it seems best. Since rest of the lungs secured by various methods is still the most effective physical treatment for the tuberculous patient, all that tends to make rest inviting is important.

In book selection, the contrast between a wise selection for a public library branch and that better adapted to the needs of hospital patients is very marked. In a branch, detective stories, for example, are not a major requirement. In a hospital they are. Often, nothing can break an obsessive thought or emotion as effectively as a well selected mystery yarn. Thoughts and emotions can be dangerously obsessive in a hospital. Detective stories can make a very definite contribution in therapy. Light fiction and literature, too, have a more important place in the hospital than with people who are well. Many patients, who, if they were well, would read heavier books require lighter ones because mental rest is regarded by doctors as almost as important as physical. Books with a good laugh are required tonic and books of humorous cartoons have in consequence an honored place. A satisfactory selection of books for any hospital

requires a sympathetic study of the wants and needs of the patients and should be based to a large extent on what can be learned from experience with them.

Wise selection of books for a tuberculous sanatorium is a challenging task. It is recognized that tuberculosis hits the very ablest in the community, so much so that a study of tuberculosis in relation to genius has been made. It is also true that poor living conditions are often a predisposing cause for the disease and the mental anxiety frequently associated with poverty would be equally responsible for predisposition to it. Tuberculous patients come from varied backgrounds. Many share in common the qualities of independence, sensitiveness and a rare capacity for brave living. These qualities may seem more marked among white patients who have had, as a rule, many more advantages, but there are many fine negro patients who possess them. Some patients, more especially among the white, have had a very fine education. Other patients, without privileges of background and education, possess native keenness and are mentally alert with an inherent capacity for intelligent reading. The majority of patients have the same kind of tastes and interests as the majority of people in the community outside the walls. "Best sellers" are read and enjoyed by many of the patients, although they are scorned by others. While the publicity experts and publishers of the day are not infallible, they try to take advantage of popular tastes and have studied the characteristics that are likely to appeal to the average reader. Besides American detective stories, sea stories and "westerns," historical novels, even long ones, are very popular. It is the action and adventure and the romantic trappings in them that appeal. Books of travel that describe the social customs of other countries, and those that feature adventures in the wilds and among primitive people also have a large number of readers. Books of the finest calibre of all kinds and many of the classics are also in demand. The task is not easy, but the search for books which will be of interest to the patients and helpful to them is a rewarding one.

In the practical considerations of the tools for use in a hospital library, the machinery

should always be regarded as a means to an end and not as an end in itself. The welfare of the patient should always be the center of the work. Processes such as cataloging and charging systems should be as simplified as possible and record keeping should be designed for some definite purpose needed to further the work. Book selection should always be a matter of careful deliberation and one part of the work that should never be slighted. That, and personal contacts with the patients should be regarded as the professional aspects of the work to be done only by qualified, trained people. The clerical and technical work of the library require intelligence, neatness and accuracy, and can be given into the hands of anyone who has those qualities and the needed instruction and practice. If trained typists are available, they can give invaluable help. Patient assistants can be of great help in the routine work of the library and occasionally in that part of the work that requires professional standards. Library work can arouse keen interest in the patients having part in it and frequently extends general interest in the library among other patients. It helps determine vocational interests and abilities for further clerical work, if not library training.

The training requirements for a librarian are graduation from a recognized college or university plus a B.S. degree from an accredited library school. This can be a one or two year course. In addition, a hospital librarian should have at least four years' experience dealing with books and people in a public library, or its equivalent, and, if possible, some work as a readers' advisor. A course in hospital library work should also be taken in some recognized school. The schools giving

such a course at the present time are Columbia University, Simmons College, the University of Denver, the University of Minnesota and Western Reserve University.

A list of references for hospital library programs might include the following:

*Objectives and Standards for Hospital Libraries*

Hospital Libraries Division of the American Library Association, 50 East Huron Street, Chicago, Illinois

Jones, E. Kathleen

*Hospital Libraries*

American Library Association, 1939, \$2.50

Jones, Perrie

*1000 Books for Hospital Libraries*

University of Minnesota Press, 1944, \$.50

*Hospital Book Guide: a quarterly buying list*

American Library Association, \$1 per year

Mason, M. F.

*Patients' Library: a guide book for volunteer hospital library service*

H. W. Wilson Co., 1945, \$1

Doe, Janet,

*Handbook of Medical Library Practice*

American Library Association, 1943, \$5.

Many occupational therapists have done, and are doing, fine work pinch-hitting for hospital librarians where none are available. They have laid the groundwork and can do a great deal to develop a more recognized need for the trained hospital librarian. As trained hospital librarians grow in number the work of the occupational therapist will be lightened and she can give more of her time to the work for which she is specifically trained. Both of the professions will be made richer by the cooperation between them and hospital patients will be given more adequate and rewarding service.

# Finger Painting in an Occupational Therapy Program

By PETER J. NAPOLI, *Asst. Chief Psychologist, Veterans Adm., Brooklyn Regional Office, and*  
BEATRICE E. GOLD, *O.T.R., Occupational Therapy Dept., Brooklyn State Hospital, Brooklyn, N. Y.*

Recent developments in finger painting (1, 2, 3) reflect the widespread growth of the finger painting medium from the recreational and educational application to the field of psychiatry. The established value of this technique in personality appraisal makes it an invaluable addition to a functional occupational therapy program in a mental hygiene unit.

Finger painting as a tension releasing, relaxing medium together with its contentual expression gives insight into the total personality. The etiological factors of the behavior pattern are apparent through the correlation of the physical behavior, the graphic representation, and the verbalization of the patient throughout the painting series. The fulfillment of these qualities places finger painting among the more therapeutic techniques in a mental hygiene program, insofar as it has been developed to date.

Finger painting as a technique is best integrated into the routine program of the hospital when administered in and through the occupational therapy department. This instrument, as an adjunct to psychiatric services, promotes the liaison between the psychiatrist, the psychologist, and the occupational therapist.

The general demeanor of the occupational therapy shop often lends many opportunities for establishing an easy rapport. The therapist finds herself in the enviable position of contributing concretely to the case record of the patient.

Theoretically the advantages found in this type of program are so numerous that to mention all of them would in itself comprise an entire paper. An attempt shall be made to point out the major reasons for considering this instrument among the prime therapeutic measures for the psychotic and the neurotic patient.

The only specialized equipment needed for the project is the standardized finger paint and the finger-paint paper. The remainder of the

kit, the sticks, the pan for wetting the paper, crayons, pencils, pans for sprinkling, and a bucket for washing up may be obtained from hospital supply sources.

The characteristics which adapt this medium especially for psychiatric work are many. The paint, being slightly resistive, allows for a warming-up period. Finger painting acts as a tension-releasing agent. Mental catharsis is valuable to the patient and allows him to dilute his feelings, especially guilt feelings. His projections reveal mental dynamisms in play. It has been found that the medium acts as a stimulant to patients who fall into the classification dementia-praecox-catatonie type. These patients have responded by becoming more active kinetically during the painting sessions.

An important consideration with this type of patient is the non-poisonous and non-staining qualities of the paint. One of the patients in the group used in the experiment consistently ate as well as smeared the paint. He had no ill effects physically, and the psychological value obtained when he was shown how easily the paint could be removed from his clothes and the equipment was immeasurable.

The rapport established with the patients is one which leads to socialization among the group. All of the patients doing the same thing simultaneously creates a common ground for socialization. Patients show interest in comments on their own work, as well as in the work of the others. The group activity reveals material significant of the patient's personality which may be contributory to the case history. One of the patients in the experimental group stated that it was not until he had seen what other people could do, and talked with them about it, that he realized he could find common ground for discussion with other people in the hospital. For the first time, the patient made a concerted effort to make friends with patients in the ward. It

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†The authors acknowledge their appreciation to the Administrators of Brooklyn State Hospital for permitting this project to be undertaken.



should be mentioned here that criticism should not be given from an artistic standpoint, and all comments must be given with the utmost sincerity. It is the administrator's duty to establish confidence in this way.

Mental hygiene programs usually are interested, among other things, in teaching habit training to their patients. This medium is excellent for teaching cooperation, neatness, sequence or order, social amenities, etc.

Cooperation is experienced by having the patients use the materials at the same time. This necessitates sharing the materials with each other in a cooperative system. The habit of neatness is illustrated during the original demonstration period. The patients are taught to finish-up<sup>2</sup> by washing the paint from the table surface, washing their hands, and returning the equipment to its original place. It is encouraged by complimenting the patient on the manner in which he executes those phases of the technique which are commendable. It is best that no comments be made on those phases of the technique which are not executed in a commendable manner. Sequence is one of the basic elements of the finger-painting program. The manner in which the painting process is carried through has a definite order to it, and this order is logically illustrated and explained during the demonstration periods. Finger painting, as such, has been found excellent for all diagnostic groups. Catharsis in this manner is beneficial to every patient because it gives him an opportunity to project his feelings in a constructive and approved method.

Special characteristics of the medium and the process are adequately covered in the literature (1, 3), and need not be reiterated here.

The gradations possible in finger painting are numerous. This aspect allows one to consider the finger-painting medium from a therapeutic standpoint in addition to its projective value. The ingenuity of the patient allows for variation in color, texture, plan, and technique. One can say then that for these reasons the use of the medium varies from a simple to complex intellectual function. The manual dexterity of the patient may be primi-

tive or highly skilled, the production will be satisfactory in either case. The movements of the patient may involve large muscles and/or finely coordinated muscle motion which involves the entire musculature. The amount of dexterity the patient shows as the painting series progresses is an indication of the kind of craft work the patient will be best able to execute. The physical satisfaction derived from the experience is great, since the patient can do as much or as little physical work as he desires.

Administratively, this project may be correlated with the arts and crafts programs. Since the program permits much group activity, one therapist may observe many patients at one time.

Skilled supervision is desirable if the maximum benefit is to be obtained from such a project. It is necessary that the therapist be skilled in the finger-painting technique. The therapist who acts as administrator, aware of clinical techniques, should have ability to objectively record all observations and all findings. She should be well oriented in the psychological aims and objectives of the finger-painting program. Psychiatric training is of great importance, as the therapist cannot adequately establish the rapport necessary with the people she contacts without much knowledge. Finger painting used dynamically rather than diversionally, requires interested, sympathetic, and intensive understanding as well as training in technique. In addition it aids the occupational therapist in recording a more accurate account of the patient's behavior.

The aims and objectives of finger painting used functionally must be understood by the hospital staff before such a program can be established. These are:

1. That finger painting used dynamically is not to be construed as a craft or as a diversional medium; rather it is to be considered as a clinical instrument.
2. That finger painting as a projective technique allies psychiatric and psychological personnel with the occupational therapy staff, and effecting a more clinical personality appraisal of the patient.
3. That finger painting gives opportunity

<sup>2</sup>Pg. 165, ref. 2.



# FINGER PAINTING IN AN OCCUPATIONAL THERAPY PROGRAM

for occupational therapy members to add significant dynamic material in revealing the patient's inner psychic life.

4. That finger painting affords the occupational therapy department the opportunity to contribute significant material at staff meetings.

5. That the addition of concrete evidence of the patient's performance adds to the case record in terms of total personality behavior.

6. That finger painting, when used dynamically, offers therapeutic benefits not possible with other projective techniques—diagnosis and therapy going along concomitantly.

The following procedure was used to incorporate the finger painting program into Brooklyn State Hospital. The Director<sup>3</sup> of the hospital was approached with a full explanation of the above stated aims and objectives, to obtain his approval and cooperation in establishing the program. A definite and completely detailed program was discussed with the medical administrator of the occupational therapy department.<sup>4</sup> With his approval, the chief of the occupational therapists was approached and informed of the program. Arrangements were made at this time for a conference between the administrators of the program, namely, the assistant medical director, the psychologist, and the occupational therapy chief. This meeting allowed for a complete understanding among the people vitally concerned with the administration of this program.

The personnel of the occupational therapy department was then oriented to the project at another meeting in which the program was explained. At this time, the staff had opportunity to discuss the project in terms of the interrelated mechanics of the set-up. Theory and technique of the finger-painting process were also presented and discussed.

The physical environment of such a program is of major regard. One of the reasons for choosing the occupational therapy department is that the physical set-up is one which facilitates the arrangement of the mechanics of the

program. The occupational therapy department is the place where most materials necessary, i. e., tables, water, supplies, space, etc., are usually found. The essential requirement is that the physical set-up remain the same throughout the series. One should remember that the best physical set-up is the one which enables the administrator to complete the observations and supervise the activity with ease.

It has been found that while observing the maximum number of patients the following arrangement (Fig. 1) has proven most suitable:

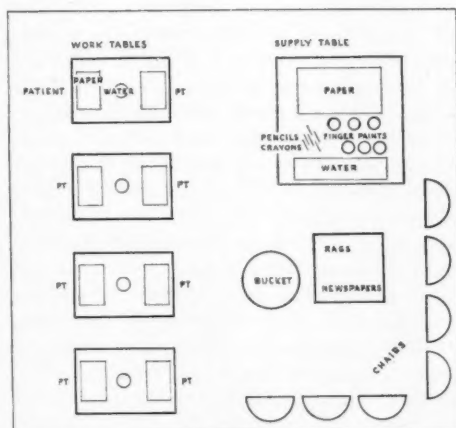


Figure 1

To enable the therapist to place herself in a strategic position for observing all patients, the tables were arranged in a consecutive vertical order. The working surface should be larger than the paper, allowing a minimum working surface of 24" x 30" for each subject. The table should have a smooth water resistant surface. When the table surface is not suitable, other surfaces of the size mentioned above are necessary. The best surfaces for painting are battleship linoleum, varnished masonite, and porcelain tops. Glass is inadvisable for use with mental patients. Any cracks in the surface make it inadequate to work on and this affects the final results.

A small pan used to maintain the desired texture while painting is located near the subject. It is best not to have more than two patients share each pan. One table should be set up as a supply source. The materials should

<sup>3</sup>Clarence H. Bellinger, M.D., Medical Director, Brooklyn State Hospital.

<sup>4</sup>Nathan Beckenstein, M.D., Asst. Medical Director, Brooklyn State Hospital.

be placed on this table in the following order:

1. pan for wetting paper
2. paint
3. sticks
4. crayons and pencils
5. unused paper

This arrangement protects the unused paper from becoming wet. It hastens the process, allowing one subject to prepare his paper while another subject is wetting his paper. The water in the pan for wetting the paper and in the pans used for sprinkling should be pleasant to the touch, as having it at extreme temperatures, i. e., hot or cold, sets up resistance in some patients.

The chairs in the room should be moved to one side and covered with newspapers, in order to have sufficient surface to set the paintings on until they dry. This utilization of the chairs acts too as a reasonable excuse to those patients who are resistive at the thought of standing while painting. The posture of the patient, one of the items on the recording sheet,<sup>5</sup> may be easily observed in this way.

#### SUMMARY

1. The finger-painting technique has been described as a functional activity in an occupational therapy program of a mental hygiene unit.

<sup>5</sup>Undergoing final revision before publication.

2. Administrative channels for the set-up of such a program have been explained.

3. The variable use of the finger-painting medium as a projective technique, as a therapeutic agent, and as an arts and crafts medium, gives this instrument a prominent position in a progressive occupational therapy program.

4. This medium can be used as a transitional vehicle from recreational to occupational therapy.

5. The psychological and therapeutic values obtained ally psychiatric and occupational therapy personnel.

6. The opportunity to observe the patient's physical performance, mental projections, and verbalization concomitantly offers a more comprehensive appraisal of the total personality.

#### REFERENCES

1. Napoli, P. J., Finger Painting and Personality Diagnosis, *Genetic Psychology Monographs*, 1946, XXXIV, 192-231.
2. , Finger Painting and Personality Diagnosis, *American Psychologist*, 1946, 1, 240 (abs.)
3. , Interpretive Aspects of Finger Painting, *Journal of Psychology*, 1947, XXIII, 93-132.
4. , Finger Painting—A Bibliography, *School Arts*, 1947, XLVI, 6, 208-210.
5. Russell, John, *Occupational Treatment of Mental Illness*, 1938, Wm. Wood & Co., XVI, pp. 231.

## A Glimpse into an Aphasic's World

By ELEANOR T. ALBERTSON, O.T.R.

Colorado Society for Crippled Children, Denver, Colorado

I was a new student in an army hospital, and the starch in my uniform was still about all the assurance I had that showed. I was just screwing a piece of wood in a vice when my director came up to me with an unfamiliar patient and introduced him to me, ending by stating frankly, "This patient has difficulty in expressing himself." I felt like laughing. For this struck me as a common enough difficulty which most people, unfortunately myself especially, suffered from in frequent dark moments! Yet as I stared at him (as I must have), he did look painfully unhappy and had a way of squinting his eyes as if to see better. All the time he said nothing. When he finally turned, I noticed there was a large, uneven indentation

on the left side of his head. Strangely reassured by this grim but concrete evidence, I quickly showed him what he might do in wood-working. But he was resistive to this idea and seemed insulted by my suggesting it to him. I left him for a moment. He wandered away from his work bench. From the back of him he looked bewildered and lost. When I caught up again with him, I found the man staring at a G I's water color with a scrouged up face. My talking seemed not to reach him. He wasn't in the mood to leave. At last he turned and pointed to himself, "Me!" and gestured *painting* with his hand. "Of course! Of course!" I answered relieved, and ran for the paint brushes . . . It was by

watching and listening to him while he painfully painted that I first learned what it meant to be aphasic.

The human brain is divided into two hemispheres, the right and the left. The right hemisphere in many ways controls the left side of the individual; the left hemisphere the right side. One of these hemispheres is usually dominant over the other, coordinating those activities which involve the whole body. Some people are right-handed, meaning that the left side of the brain is dominant, while others are left-handed, meaning the right side is dominant. This dominant hemisphere, whichever it may be, is the brain's central workshop for creating manual skills and language. And it is in the different regions of this hemisphere that sights and sounds are sensed, recognized, and understood in this order through a highly intricate pattern of association fibers. Within the temporal region lies the ability to hear sounds, to gather and to sort them into recognizable words, and to associate meaning with these words. There are areas for speech too, motor areas, above and in front of this auditory part of the brain. While the occipital or lower back region of the brain gives us our sight, objects being mentally photographed here, acknowledged and interpreted. These highly complex auditory, visual, and motor speech areas in turn are interdependent on each other in all of our learning.

Those individuals whose dominant hemisphere has been injured, as it was severely in the patient with "difficulty in expressing himself," we call aphasic. They may have lost the ability to understand spoken language, written language, or to express themselves, due to an injury to the auditory, visual, or speech area. In most aphasics several areas are involved. Any speech the aphasic hears may sound as unfamiliar to him as a foreign language. A boy in recalling the first phases of his aphasic days recently wrote, "Reading\* was just plain nil, as I couldn't figure out if the words were written in English or Chinese. Today reading is still the hardest for me to master." Furthermore, an aphasic shown a picture of Main Street in his home town will probably see the street as a street, perhaps as one which is

familiar to him, but just why it is so familiar he has forgotten and is unable to remember. The street has been sensed, perhaps recognized, but not understood. Again, in speaking the aphasic knows what he wants to say, but he forgets the words one uses to express his thought. Often in groping for one word he hits on another quite similar in sound but dissimilar in meaning, or makes up his own word. The child's rhyme of the elephant and the telephone in delightful *Tirra Lirra* illustrates the hit or miss jumble and rambling of an aphasic:

"Once there was an elephant  
Who tried to use the teleph—  
No! No! I mean the elephone  
Who tried to use the telephone.  
(Dear me, I am not certain quite  
That even now I've got it right.)  
How e'er it was, he got his trunk  
Entangled in the telephunk;  
The more he tried to get it free,  
The louder buzzed the telephee.  
(I fear I'd better drop the song  
Of elephop and telephong!)

(from *TIRRA LIRRA, Rhymes Old and New*,  
by Laura E. Richards published by Little,  
Brown and Company.)

Another equally curious result of an injury to the speech area is that although many aphasics can carry on a conversation, their words are mostly pronouns and prepositions, adverbs and adjectives. With the exception of such early-learned words as *mother* or meaty swearing, the aphasic has lost the ability to use nouns, particularly abstract nouns. They talk instead "all around a subject." The aphasic rooted in front of the water color could not remember the noun *painting* and had to gesture it with his hand. An explanation for this retention of some words and not of others is that a noun has a more intricate thought concept behind it than the more spontaneous swear-phrases or simple pronouns and adverbs.

As if the breadth of the aphasic's injury weren't enough already, in addition to lacking the ability to hear, see, or speak normally, that side of the individual is frequently flaccidly paralyzed which receives its motor nerves from the injured dominant hemisphere. The normally right-handed aphasic finds his right hand hanging limp and useless across the front of his body, his right foot dragging when he takes a step.

\*Reading is dependent on both seeing and hearing.

Until this last war what had been discovered about aphasia had been gleaned principally from observing elderly people suffering from strokes and small children who were not learning to speak properly and showed evidences of suffering from a pre-natal or birth injury to the seemingly dominant hemisphere. Records of industrial accidents resulting in diagnosed aphasia seem to have been few. But the large number of traumatic aphasics who returned from this past war, being previously normal but now with their mental faculties impaired (giving a measurable contrast) and having still the physical resilience of youth offered a much better study of what aphasia is and how to re-educate one suffering from it. In the first World War England did a lot in studying aphasia and in exploring to what extent recovery is possible. Today much more of the medical world has been educated to recognize the aphasic as distinct from other mentally ill persons. Also, because the neurosurgeons with new "drugs" were on the front lines of battle to an extent they had never been before, we were able to save, as everyone knows now, an amazingly high percentage of our critically injured men. But since recovery from a brain injury and the re-education necessary goes at such a snail's pace, it is still too soon to predict the future of this war's aphasics. Some are in veterans' hospitals; others attending physical occupational, and speech therapy clinics; still more are not continuing with any formal re-educational program.

Most of the "come back" of the aphasic will occur in the first six months after receiving his injury. Much of this is due to the wound itself healing after surgery. But the patient will to a varying degree still be left impaired, for scar tissue inevitably remains. Improvement from then on is probably made by using previously unused, neighboring association fibers to take the place of those which are damaged or destroyed. Also it is believed now by many neurologists that ability for symbolic understanding as well as our manual skills, although developed more highly in the dominant hemisphere than in the subordinate one, nevertheless is present in a rudimentary way in the latter. Words which have become most automatic for us to say (as *mother, O.K., yes* and

*no*, etc.) have been transferred previously to the subordinate hemisphere. Hope for improvement, therefore, would lie not just in the establishing of new association patterns in the brain's dominant half, but in this "taking over" by the subordinate hemisphere the former's responsibilities through drill and repetition.

One marvelous thing about the aphasics, even those who suffer from an extensive injury, is that so often the personality nugget cells of the brain have escaped injury, and these people are still the same Billy, Sammy, or Jake they always were. The continual frustration of not being able to "communicate either way" with the world outside one, however, is a shocking thing which naturally shakes the whole individual and which he will have to put up with in one way or another for years rather than for months to come. Yet to be able to appeal to the pride and dignity of a personality instead of having to treat a mind helpless or foolishly childish should boost immensely both the aphasic's and the therapist's hope for substantial improvement.

Occupational Therapy, to begin with, has meant a lot to the aphasic patient's fundamental need for security. They are cruelly frustrated in not being able to think and act constructively as they used to, or to communicate with others. They suffer from continual confusion, in addition to loneliness, and from the discouragement of not seeing rapid improvement in themselves. They become physically and nervously exhausted in performing the simplest daily activities. We tried to keep our shop projects fast-moving and easily accomplished with obvious success. One severe aphasic, well-aproned, began by slapping paint on wide areas of flat furniture on a floor defended with layers on layers of newspaper. According to the degree of the patient's paralysis, it's imperative to emphasize activities which will help with his personal needs, as tying one's shoestrings, buttoning buttons, cutting meat, etc. We learned also that aphasics worked best when most relaxed and when directions were kept simple and specific. At times we were able to adapt a manual skill a patient had acquired before injured to use again in the shop, offering him a greater sense of security. We encouraged the patient to use his affected



arm and hand as much as possible; but when the dominant arm was completely paralyzed, we worked also towards getting the other hand to take over the dominance. Practice in the voluntary use of the large muscles is important in the O.T. shop before the patient can imitate in the speech clinic the complicated muscle movements involved in producing speech sounds.

The aphasic yearns to regain speech and literally dreams of talking. The best possible speech retraining is essential for him. However, our hospital and, no doubt, most others during the war were not staffed with speech therapists, who apparently were very scarce. We therefore experimented with our own simple and inadequate speech therapy. We began usually by teaching the aphasic the sounds that made up his name, his home address, and the name of the hospital. We encouraged him to tell us his autobiography while we wrote it down, helping him to "put together the pieces." We re-read this to our story's hero frequently. Since words are more easily recalled when gestures are attached to them, we practiced also on *How do you do's* and *Goodbye's*, etc. Similarly, we worked to help the fluency of his speech by associating words with one or more of his senses. For it is much easier to remember the sounds in the word, *coffee*, when you are warming your hands on the cup, breathing in its fresh, breakfasty aroma, feeling the steam of it on your cheeks, and finally drinking the black hotness down (particularly if one loves coffee). It is not surprising, therefore that the first word one aphasic was heard to say was *beer*. Singing also encourages speech. An aphasic with only a dozen words in his voluntary speech, with another accompanying him, may sing the first stanza of a well-known song. Generally, the more relaxed and informal the atmosphere, the less labored is the aphasic's speech. Aphasics, of course, do well to mingle with others like themselves, encouraging each other to talk more. We practiced writing also, the patient first copying, then taking dictation, and gradually learning to write from memory. He practiced signing his name, making out shopping lists, writing his personal letters. We worked a little with reading and with arithmetic, the latter being concerned mostly with the handling of money.

Whatever we could learn about the aphasic patient's background — his education, occupation and home life, helped us. For example, we spent several days encouraging one silent boy to speak and finally discovered that he'd probably never spoken anything but Italian at home. These families, in turn, need to be informed as to what aphasia is, to understand the slow process of re-education, and to accept the aphasic member of the family realistically but encouragingly.

Probably the greatest help a therapist can give to an aphasic is the desire to accept himself for the present as he is, while he continues to work for maximum improvement. In addition to formal re-training, he should realize the importance of enriching himself with many friends and a variety of interests. As one boy who has been home now for almost two years said very recently: "I went back to the piano as soon as I was home, and that piano exercising helped me plenty. Now I'm taking a course in harmony and that helps my reading and memory. I'm no Iturbi on the piano, but that piano practice has given me power and some control over my arm and fingers." Formerly this boy had planned on being an electrical engineer. Now he has decided he will be better adapted for some "close-to-music" profession. Other aphasics will find they can start right off raising laboratory mice or fancy oriental chickens, which, besides making much more delightful conversation than one's office routine, can earn the ambitious aphasic a good living. There are many professions today which are "financially fair and socially fashionable" because of their originality, into which the aphasic can push off confidently and successfully. For I rather imagine it's important that we don't wait to become what we should like to be, but do our *living* now, letting it be a growing and therefore a very satisfying and exciting thing.

#### BIBLIOGRAPHY

- Doherty, Wm. B. and Runes, Dagobert, *D. Rehabilitation of the War Injured*. New York, F. Hubner and Co., 1943.
- Goldstein, K. *Aftereffects of Brain Injuries in War*. New York, Grune and Stratton, 1942.
- Backus, Ollie L. *Aphasia in Adults*. Univ. of Mich. Official Pub., Vol. 46, No. 59, January 6, 1945.



# The Over-all Treatment of Poliomyelitis

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In the six bombastic years since America was discovered in 1941 by Elizabeth Kenny, the concept of poliomyelitis has careened sharply from antiquated, orthodox teachings. With these changes in concept has come a greater and greater use of Kenny methods of treatment in pure form and more popularly in a multitude of modified regimes ranging from slight modifications to radical dissemblances. Few persons at present still ascribe to strictly orthodox, or pre-Kenny regimes of treatment, though some writers have endeavored to rationalize that the orthodox method through purportedly similar features gave bastard lineage to the Kenny concept and treatment. Whatever pro or con may be said about Miss Kenny, it is a great credit to her to have sponsored a radical alteration in a faulty concept and to have stimulated the sea of sound and productive research which still now is not at its crest. This credit is admitted by no less a vitriolic critic than the Committee of the Orthopedic Section of the American Medical Association.

In 1944, when the Bureau of Medicine and Surgery of the Navy Department established one of its hospitals as a special treatment center for its poliomyelitis patients, it became necessary for the Department of Physical Medicine to evolve a systematized and most effective routine of therapy. In so doing, it was necessary to fit together the best features of the Kenny, the modified Kenny, and the orthodox regimens. From these evolved the conceptions, the observations, and the practices crystallized through more than two years of experience.

From the time of designation of the hospital as a poliomyelitis center, eighty-eight poliomyelitis patients were received for treatment and rehabilitation. In every case, total rehabilitation was the final objective, i. e., patients were retained until they had attained the maximum return of function. As a result, hospitalization periods were necessarily prolonged and averaged nearly twelve months from onset.

In the patient with poliomyelitis, treatment must be directed towards salvaging the maximum functional results from the debris of

damage inflicted by the virus upon the central nervous system. The basic prerequisite to good results is not only intelligent treatment, but early treatment—early treatment with immediate definitive attention directed to the phenomena of spasm, alienation, and incoordination and thus prophylaxis against contractures, deformities, alienation-paralysis, and mechanical skeletal defects.

Deformities in poliomyelitis are the consequence of unreleased muscle spasm or of tightness secondary to prolonged immobilization with or without splints. The possibility of correction through Physical Medicine is roughly in inverse proportion to the time lapse prior to institution of corrective measures.

The former conception that muscle spasm in the acute phase of the illness was the result of meningeal irritation is now disproven as the complete picture. Spasm is a reflex phenomenon due to the release of proprioceptive reflexes from higher centers of inhibition which probably reflects internuncial cell involvement in the spinal cord. Spasm does not necessarily reflect anterior horn cell damage, and it should be pointed out now that spasticity and weakness, therefore, are basically separate phenomena. Spasm may be present in one muscle without any weakness in the antagonist group or it may occur per se in a weakened muscle. It is important that measures be instituted early for the relief of spasm not only because of the mechanical impediment per se, but in order to permit a normal range of motion for the antagonist muscle or muscle group. Failure to correct the spastic condition may result in permanent deformity and in the dysfunction of antagonistic and synergistic muscles, the so-called "alienation" phenomenon of Kenny. The longer spasm, or a contracture, is permitted to exist, the poorer is the possibility of restoring function to the potentially functional antagonist. Unreleased spasm produces contractures, which in turn produce deformities.

The most commonly encountered deformities, seen particularly in patients where transit had been prolonged or delayed, were:

1. Gastrocnemius contracture with secondary foot droop—the primary difficulty being heel cord contracture and not anterior tibial weakness. It is true that the two may be associated—i.e., spasm or tightness of the gastrocnemius and weakness of the anterior tibial—but from a standpoint of therapy, the spasm or tightness of the gastrocnemius is the basic feature to be corrected, for until this is relieved, evaluation and treatment cannot be adequately carried out on the anterior tibial, even though it approach normal from a standpoint of innervation.

2. Hamstring contracture.

3. Pectoral contracture.

4. Quadriceps contracture.

5. Plantar fascia contracture.

6. Back tightness without, or with, secondary scoliosis.

7. Back kyphosis and lordosis secondary to tightness of the back, iliopsoas, or quadriceps muscle groups.

8. External rotational contractures of hips.

9. Pronator contracture of the forearm.

In treatment of the acute stage of muscle tenderness, the so-called spastic stage, hot moist packs are the most effective therapeutic agent. The technique for packing is Kenny's.

The patient's bed must be firm with bed-boards. Foot boards of plywood should be in place with the mattress bed-blocked away from the foot-piece. The patient should be kept in good alignment in bed with feet planted solidly against the foot board in order to maintain the normal standing reflex. The patient must be kept a strict bed patient.

Muscle reeducation is started early in the first few days as soon as muscle soreness begins to subside. Methodical muscle training is carried out daily in accordance with Kenny's method and in accordance with her functional classification of muscles. In recent years, the question of alienation has received considerable verbal tossing in the literature as a result of Miss Kenny's coinage. Its cause is still a matter of conjecture. That, however, a patient may forget how to use a muscle is not conjecture, but is a real and urgent problem which demands early skilled muscle reeducation by a technician with experience and good physical therapy training both in the method and in the principles of functional anatomy. The utilization of myotatic reflexes through tendon

stretching and stimulation is a valuable aid in reestablishing voluntary motor patterns and is to be used in all patients early as a part of muscle reeducation.

In conjunction with muscle reeducation, the early restoration of a muscle to, or maintenance of, its normal length is most important. As previously mentioned, muscle reeducation in the face of shortened antagonists is prognostically a poor procedure. Furthermore, the cycle of muscle spasm to muscle contracture to deformity must constantly be borne in mind as a stimulus to restoration of normal length. As the acute spastic stage subsides, gentle stretching is started on all shortened groups. This must be pursued gingerly at first and the degree of stretching must be determined in each individual case by the amount of pain entailed. It has been our experience that often in the recuperative poliomyelitis, a persistence of so-called spasm in a muscle group is not a persisting acute process but rather soreness and muscle tenderness secondary to the anomalous functional length. Such muscles must be diligently stretched to normal length. In chronic cases with frank contractures, intensive local packing is often of help in alleviating the local pain consequent to stretching and thus of aid in the more rapid restoration of normal muscle length. Stretching may be passive, active, or active-assistive, usually graduated in that sequence.

The use of the vagotonic drug, neostigmine methylsulfate, has found much favor in recent literature for the relief not only of acute spastic poliomyelitis but also of the chronic contractual stage. The mode of action in relieving muscle spasm or tightness has not been satisfactorily explained on its expected vagotonic basis unless we are to accept the conjecture that its action is centrally at the internuncial cell synapses. It has been shown electromyographically, that luminous heat and prostigmine will produce a decrease in muscle spasm of approximately twenty-five per cent. Methods of use have varied widely from the conservative use in conjunction with packs to the more radical use alone with muscle reeducation. The results reported have not been uniform. In the cases so treated in this series, there were non-uniform but distinct beneficial effects in some cases; it would therefore seem advisable to

employ the drug routinely as an adjunct to other therapy.

In the wake of muscle spasm, despite intensive packing and progressive stretching, there often will be left low grade general stiffness. It has been repeatedly pointed out that prolonged immobilization fosters muscle atrophy, joint stiffness, and vasomotor changes. The early initiation of hydrotherapy provides a remarkable boost to the progress of a patient who otherwise might appear to be reaching a static phase. It has been policy therefore to initiate Hubbard bath treatments with a gradual decrease in hot packing as soon as possible. This is usually three to ten weeks post onset. During these Hubbard treatments, reeducation exercises, progressive active exercises, stretching, and underwater massage are carried out in graduated doses.

Complete muscle testing should be done immediately upon arrival of each patient or as soon as possible in cases of extreme weakness or of marked muscle spasm and tenderness. Serial tests should be done at monthly or bi-monthly intervals since these tests represent the best over-all index of progress and thus of prognosis.

As soon as the spastic stage of muscle soreness is passed, even though there be residual muscle shortening, it is important to start reambulation. Much has been written pro and con regarding the hazards of fatigue in weak muscles. It must be here emphasized that muscle hypertrophy occurs in direct proportion to the demands placed upon the individual fibers and that mobilization of maximum functional power can be obtained only as a physiologic response to a demand. Excessive fatigue is admittedly a pitfall to be avoided, but it should be considered as such and not as a barrier to early reambulation.

Bed-sitting is the first step toward reambulation. This is permitted in four to eight weeks, after spasm has been eliminated, and without regard for persisting shortening. At first the patient is allowed to sit on the edge of his bed with assistance once a day in increasing doses until able to sit up for meals. After approximately ten days of this, he is permitted to place his feet on the floor and with support to leg-stand. He is taught hip-stabilization. As he becomes accomplished in standing, weight-

shifting from foot to foot and balance-shifting forwards and backwards are added. It is of interest to note here that occasionally a patient with functionally weak muscles of the lower extremities will respond to the muscle stimulation of stand-balance procedures with contractions when he has remained refractory to other reeducation procedures. With weight-shifting and stand-balance mastered, the patient is ready for the first step. Just as he has been taught the skill of weight-shifting and standing, so must he be taught a rhythmical coordinated gait. Substitution must be avoided. Posture must be constantly supervised and corrected. Where possible, there should be no assistance. Usually, however, the patient must rely at first upon one or two assistants, on a mechanical walker, parallel bars, or Canadian sticks. Long crutches are undesirable and should be avoided insofar as possible because of the tendency for the patient to place all reliance upon the strength of his arms and shoulders. Laying the basic good habits of correct posture and correct gait is a well-paying investment fully worth the necessary tedious and constant efforts; bad postural and gait habits are faults most refractory to correction.

In severely handicapped, it may of course be necessary to carry on underwater exercise, standing, weight-shifting, and walking in a therapeutic pool for months before muscle power will permit accomplishment of such feats against gravity.

In the patient with complete denervation of lower extremities, it is necessary to supply supports at the start.

Pool therapy, like Hubbard tank therapy, is a procedure to be used early. It is the next step after initiation of the Hubbard baths. Underwater reeducation exercises; stretching; active, active-assistive, and resistive exercises; stand-balance; and walking are all procedures to be carried out in graduated progressively increased doses.

Serial chronaxie evaluations are at times valuable prognostic aids; they have been infrequently employed because of the complexity and expense of the heretofore available machines. In these patients we have used a new compact simplified machine, the Galconotron, which is small, economical, and considerably less complicated in operation than the average ma-

chine. Aside from its value in chronaxie determinations, the Galconotron can be used as a relatively painless instrument for obtaining powerful muscle contractions with a minimum of the subjective burning and discomfort encountered with other machines currently on the market. Because of this painless feature, it can be used successfully for muscle reeducation in both alienated muscles and in muscles which because of extensive damage have become too weak to be of functional value. In the case of weakened muscles damaged beyond the level of functional use, the objective is to minimize atrophy and at the same time to speed hypertrophy of the remaining intact muscle fibers to a power level of functional value to the patient. In such cases, sessions of gradually increased electrical stimulation with the Galconotron are of benefit and may be increased to as long as fifteen minutes twice daily.

For every patient specific remedial exercise regimes vary depending upon the degree and sites of involvement. Early inauguration of remedial exercise after the hot pack stage retards atrophy and speeds hypertrophy. For each patient there must be an evaluation and a prescribed individualized routine of exercises. While these are usually pool or table exercises at the start, they must be constantly revised and graduated in each case, ultimately reaching the stage of weight resistance and gymnasium procedures.

General reconditioning ward exercises are initiated for all patients as soon as they are out of packs.

In general, it is desirable to delay the application of braces until time has elapsed for maximum recovery or until it can be accurately prognosticated by progress, muscle tests, and chronaxies, that nerve involvement has been sufficiently extensive to negate hope of recovery to a functional level. Braces, then, are a final rehabilitation aid with two exceptions: (1) those cases in which weakness presents a gross distortion of normal gait, and (2) those cases with marked relaxation of periarticular structures presenting potential subluxations.

The ability of a patient to walk is often an amazing revelation attributable to nothing more tangible than the patient's will to do so. It has been repeatedly shown in these cases

and in reports of others that movement is a question of balance and coordination and not of great muscular strength, and often despite contrary logical conclusions from muscle testing, the patient will have sufficient residual nerve fibers to bring about muscular movement and a balanced locomotion.

The use of Occupational Therapy in the treatment of the poliomyelitis patient must be judiciously prescribed and should be administered by a therapist experienced in orthopedic work. It should be closely coordinated with the work of the Physical Therapy technician. In the acute stage, the amount of Occupational Therapy to be permitted is markedly individualized depending upon the severity and extent of the disease process. On the whole, it is least applicable to the acute patient. If it is to be employed, it is imperative that muscular incoordination and aggravation of muscle spasticity be avoided. In the sub-acute and chronic stages, Occupational Therapy can be most valuable. In these later stages, it should be correlated with the Physical Therapist's work and supplement her reeducation procedures by providing projects to increase power in specific muscles and projects which will solidly establish correct patterns of muscle behavior.

As with any chronic disability, poliomyelitis entails many months and often years of rehabilitation. These relatively idle months can breed mental lethargy and introspection unless constantly combated. While verbally easy to analyze, the maintenance of high morale is in many respects the most difficult objective to attain; at the same time, it is a most important one, for upon its attainment largely rests the success of the entire program of both physical and mental rehabilitation. Medical honesty with the patient is a prerequisite to good morale. The sponsorship and encouragement of vocational orientation and training through Educational Services during the prolonged rehabilitation period is of utmost importance. The fostering of economic readjustment provides the patient not only his entree for return to society, but is potent prophylaxis against Hospital Fatigue. This expanded concept of medical responsibility is one which cannot be rejected, but one which must be demanded and intelligently pursued.

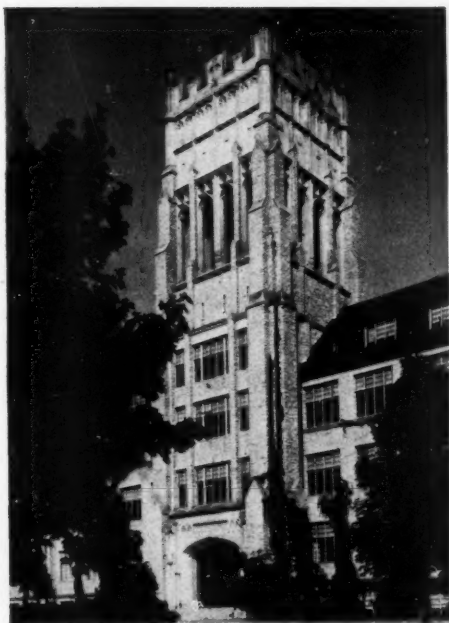


## SCHOOL SECTION

### MOUNT MARY COLLEGE DEPARTMENT OF OCCUPATIONAL THERAPY

2900 North Menomonee River Drive  
Milwaukee 13, Wisconsin

SISTER MARY ARTHUR, O.T.R., Director



To a casual remark, made by a member of the Civil Service Commission who visited Mount Mary College in 1940 and observed the spacious quarters reserved for arts and crafts in Notre Dame Hall, may be attributed the inspiration that led to the introduction of an occupational therapy department. He suggested to the administrators of the College that they take steps to discover the needs in this field and to explore the possibility of satisfying the demand for trained workers.

The College had its origin in St. Mary's, founded as an academy at Prairie du Chien, Wisconsin, on the historic site of old Fort Crawford in 1872 and chartered as a liberal arts college in 1913. The opportunity for wider expansion in Milwaukee led to the transfer to its present site on the western outskirts of that city in 1929.

AJOT I, 6, 1947

When the Commissioner described the urgent demand for more occupational therapists and suggested the important service that could be rendered to society by providing the facilities for satisfying that need, the President of the College, Dr. Edward A. Fitzpatrick, sent a questionnaire to the eight hundred registered therapists of the United States seeking recommendations and advice based upon their wide and extended experience. The results of that survey were published in the August, 1942, issue of *Occupational Therapy and Rehabilitation*, Vol. 21, No. 4. At that time there were six schools of occupational therapy in North America, five in the United States and one in Canada.

Convinced that the need was great and believing that the existing departments of the college could be utilized to good advantage for the basic science courses required, as well as for the arts and crafts, the Board of Governors approved the inauguration of a department of Occupational Therapy. It opened in September 1941 with a handful of students.

In December the United States entered the second World War. What had been a tentative experiment a few months before, almost overnight assumed the aspect of a civic responsibility. Young women eager to make a contribution to the welfare of suffering humanity in a critical period of distress found opportunity to satisfy their ardent longing in the schools of occupational therapy that sprang up on every side. The meager enrollment of this department in September, 1941, was more than doubled at Mount Mary in the following year. The course was fully accredited by the American Medical Association on October 15, 1943. At the present time there are forty-six occupational therapy students enrolled in the second, third, and fourth years. Fifteen of the 1947 graduates are engaged in clinical training.

All registrants in the Occupational Therapy Department are obliged to complete one year of the college basic liberal arts requirement before beginning their occupational therapy specialization. The equivalent of one more year of liberal arts training must be continued simultaneously with the sciences, arts and crafts needed to meet the standards set by the American Medical Association and the American Oc-



cupational Therapy Association. The College desires to train therapists of broad culture and wide knowledge of literature, science, and history. The deeper their understanding of the contemporary world and its social cross currents and current events, the better fitted they are to render sympathetic assistance to their patients.

From the very beginning the emphasis of the College has been on a solid liberal arts background for all potential therapists, who must carry a major in natural science as the backbone of their scientific training. The only course offered is a five-year degree course which includes four years of academic work followed by nine months of clinical training. Mount Mary discourages the application of college graduates who wish to concentrate their training in the occupational therapy field in one year of post graduate work. The administrators prefer students who carry the regular four-year college course in which the preparation for professional work is integrated into the regular liberal arts program.

Hospitals conducted by Catholic Sisters, although conspicuous for their adoption of everything modern in hospital progress, have been slow to inaugurate service in occupational therapy. In this respect they are not particularly different from other hospitals, for everywhere these departments are still the exception rather than the rule.

One of the first Sisters to complete the course at Mount Mary, after finishing her clinical training and securing her O.T. registration, opened a well-equipped occupational therapy department at St. Mary's on the Hill, Sacred Heart Sanitarium, Milwaukee. Another is planning to introduce occupational therapy into the general hospital conducted by her religious community, St. Mary's Hospital, St. Louis, Missouri. A lay graduate of the department has successfully installed an occupational therapy department in St. Joseph's Sanitarium, Dubuque, Iowa. Another project is under consideration for New Orleans.

In the brief span of its existence the Occupational Therapy Department at Mount Mary College has justified the hopes that brought it into being and has made an appreciable contribution to the need for trained workers in

this field. Registered Occupational Therapists, trained at Mount Mary are now rendering service in widely scattered Army, Veteran, and Civilian Hospitals.

### NEW YORK UNIVERSITY SCHOOL OF EDUCATION

*Washington Square 3  
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FRIEDA J. BEHLEN, O.T.R.

*Director, Occupational Therapy Curriculum*



The occupational therapy program at New York University dates from 1941. It was then that the tensions of war were felt in all fields of industry, the professions, and the arts. Dean Ralph E. Pickett, Chairman of the Department of Vocational Education and Associate Dean of the School of Education, gathered his department together and discussed the possibilities of answering the ever increasing demands for a school of occupational therapy in the City of New York. One of the results of this co-operative bit of planning is the Occupational Therapy program which was approved by the American Medical Association in the spring of 1943. Other results of this planning yielded such valuable contributions as the War Training Program, which trained over three thousand persons for war time positions before it closed on V.J.-day, and the present and thriving

program in the field of Vocational Rehabilitation.

The occupational therapy program began in a small way. Miss Susan Colson Wilson, O.T.R., agreed to come to the University part-time and to organize the program. On the University side assisting Dean Pickett were Professor William P. Sears and Mr. Robert L. Thompson. Dr. George Deaver, M.D., director of the Department of Physical Therapy and associated with The Institute of Crippled and Disabled and more recently with the Bellevue Medical School, also worked on the problem. Some twenty-odd students were selected for the initial class. Applications for enrollment poured in steadily. It was soon obvious that a full-time occupational therapist must be chosen. Miss Frieda Behlen, O.T.R., came in the fall of 1942 and took complete charge of the curriculum and all the problems involved in administering such a program. In the following years the program grew rapidly and the full facilities of the University's instructional shops and laboratories were drawn upon for the training of the occupational therapy students. These facilities consist of the Barney Building Center, where the most elaborate and well-provided craft shops in this part of the country may be found, the science laboratories, libraries, and other special facilities made the professional program a functional one. The clinical centers were most cooperative. Today, the advisory council on clinical training consists of directors from eight Municipal institutions, four State hospitals, ten private agencies, and one Naval hospital.

At present there are one hundred and thirty-eight undergraduate and eleven graduate students enrolled. Included in this group are seven men, five Negroes, and two Chinese students. The majority of our students are from the metropolitan area, a smaller number from neighboring states, and a few from foreign countries. Students are in attendance on either full-time or part-time programs. Through the night school division and the summer school sessions opportunities are extended to registered therapists for a Bachelor of Science degree, or to qualified persons who seek certification. A graduate program is offered for registered therapists in service who wish advanced

work in clinical psychopathology, vocational rehabilitation, and special education.

The program for a Bachelor of Science degree in occupational therapy is a four and one-half year program, which includes clinical practice. Advanced standing is evaluated individually and is granted for comparable courses satisfactorily completed. Students may choose to complete their academic work and then enter clinical training or they may study for a period not less than two years and enter clinical practice during the summer months. The latter group of students must have completed the theoretical knowledge and have acquired skill in the remedial activities used in the clinical services of their choice. This attempt toward a closer integration of theoretical and practical learning has been found most satisfying to the students and the clinical centers concerned. It has also been noted that the students resume their studies with more maturity and greater purpose.

The occupational therapy program at New York University faces the future with confidence. It is prepared and willing to meet changing conditions. It looks to the National Association for its assistance and direction, and it desires to work closely with the training school throughout the world. It is only through such continued cooperative effort that professional and school problems can be solved. The profession eagerly awaits well qualified personnel with cultured personalities and adequate training to protect and treat the citizens of the world. The school, on the other hand, looks for better salaries and a more secure status, for the occupational therapist in service in order to assure the recruiting of desirable candidates. The school also needs greater facilities in the field for research and exploration. To work with others toward these goals is the purpose of the occupational therapy program at New York University.

### STUDENT COLUMN

*Editor, Marjorie Roche*

Comes winter, cold and snowy, and we students must think of Christmas presents. Being in occupational therapy makes it much nicer because we enjoy spending most of our time with craft projects, even though there are

## SCHOOL SECTION

### ACCREDITED SCHOOLS OF OCCUPATIONAL THERAPY

and those with Accreditation Pending †

Boston School of Occupational Therapy  
Affiliated with Tufts College  
7 Harcourt Street, Boston 16, Massachusetts  
Mrs. John A. Greene, President

†Colorado Agricultural and Mechanical College  
Division of Home Economics  
Asst. Prof. Helen Tobiska, OTR  
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†Iowa, State University of  
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Miss Marguerite McDonald, OTR  
Occupational Therapy Supervisor

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times when our academic studies don't get all the attention they should.

This year, as last (and in every future year we hope) Milwaukee-Downer senior O.T.'s have instructed a craft group on one evening for three consecutive weeks. The projects are varied and appropriate but usually not too large because they must be completed in the three evenings. The most popular craft is that of painting designs on wooden objects such as plates, boxes, napkin rings and letter holders. Other crafts offered are plastics and leather. The girls make anything they wish, provided it can be completed within the specified time,

and the favorite project seems to be a plastic set of salad fork and spoon.

This complete project, known as Craft Seminar, was started to help other students who were not occupational therapy majors, to make Christmas gifts. The idea originated at Michigan State Normal College but we do not know whether it has been kept up there or whether it is run on the same basis—but at Downer it has been more than successful. It is said "Practice makes perfect." The project gives students a chance to practice a little of what they have been studying and we hope that others may make use of the suggestion.

## Occupational Therapy at Butler Hospital

### A POINT OF VIEW

ISABEL C. TIEMANN, O.T.R., AND FLORENCE MURPHY, O.T.R.

*Butler Hospital, Providence, R. I.*

For many years the function of occupational therapy in many mental hospitals has been to give patients a useful occupation in order to divert their thoughts into healthier channels through the crafts, recreational activities, and job placements. This is an important function and should be considered in any well-rounded occupational therapy program. It is felt, however, that occupational therapy can and must be of greater service to the patient in helping him renew the feeling that he is a useful, adequate adult and capable of taking initiative and responsibility within the social setting.

In hospitals where care is of the custodial type, the nurse sees that ward routine is carried out, the doctor makes rounds and has interviews with the patient during the week, the patient attends prescribed activities. The patient may be robbed of his initiative by this rigid schedule. In other cases his illness itself may rob him of his initiative, but in either case he becomes dependent on the hospital. Optimally, the patient is given the opportunity to grow out of this dependence as soon as his illness permits and occupational therapy can

be of tremendous value at this point by encouraging the patients to the utmost to initiate their own activities. In this way patients may be restored to the role of responsible human beings who are capable of making their own decisions and determining how they will occupy themselves during the day within the accepted hospital routine.

The idea that patients in a mental hospital are able to do this has been shown extremely well in the Northfield Experiment which was carried on in Birmingham, England, during the recent war<sup>1</sup>. In this experiment the hospital was used, not as an established institution where treatment was given by an individual doctor to an individual patient, but as a community whose aim was resocialization through the full participation of all of its members in its daily life. Here everyone was encouraged to participate, not by the doctor, but by the other patients who were participating to the fullest. Social pressure was exerted on him. He eventually found his place in the group and became a contributing member of the community. The doctor was also a member of the community who, because of his special skills, was often

called upon when difficulties arose<sup>2</sup>. Papers on this experiment in group therapy may be found in the *Bulletin of the Menninger Clinic*, for May, 1946. Suffice it to say here that, although within most hospitals today a complete revolution to this type of therapy is fairly impossible, there are many areas in which the same principles may be used and one of them is the occupational therapy department.

Heretofore, it has often been the practice of an occupational therapy department to set up a routine schedule of activities. When the patient is considered by the doctor to be well enough, occupational therapy is prescribed for him. He attends activities, and he is expected to follow the routine. This he may do with greater or lesser satisfaction, and, psychologically speaking, he may remain completely aloof at the dance he is attending or the play he is watching. If on the other hand, this patient had had a part in planning the dance or was working in the play group it would be difficult for him to be other than a participating member of the group activity<sup>3</sup>. During this experience the patient would be given the chance to show initiative, gain self-confidence, and win the respect of others, things he is not able to do when activities are planned for him.

At Butler we are making progress in the use of these principles. It has been our aim to foster in the patient group the desire to initiate their own plans and activities. Although a basic schedule is outlined, we make every effort to encourage suggestions from the patients for changes and improvements. Gradually the attitude of our group is changing from one of passive acceptance of a program planned by the staff to one of patient-initiated activities with the staff acting only as advisors. A recent square dance is a good case in point. The idea and plan for the activity came from a young man diagnosed schizophrenic whose behavior shows bizarreness, overactivity, grinning and grimacing. Yet he spent several hours the day of the dance acting in what seemed a perfectly normal, healthy fashion. He did the calling at the party and chose the records to be used. He showed good judgment in alternating a slow dance and a fast one and a familiar one and a new one. The occupational therapy staff provided only the dance hall, the phonograph and supervision of the group. The young man pro-

vided the whole group with an afternoon entertainment in which everyone could participate. Through this activity the boy won for himself the notice and respect of the group and found suitable outlet for his own energies. It is our belief that it is the initiation of ideas, the planning of the details, and the actual working at it, instead of the mere acceptance of what is, in effect, handed to him to take or leave, that is of great value to the patient in the process of rehabilitation.

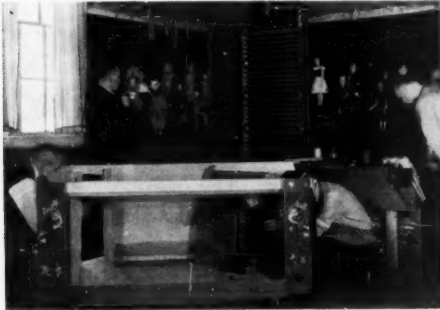
Another example of this type of activity is demonstrated in the case of a middle-aged woman who asked if it were possible to have a coffee party some morning after the group had finished preparing vegetables, which is a traditional summer duty. She was encouraged to choose two or three of the other women to help her plan the party and to act as hostesses. This she did and the activity was considered a success by both patients and staff. The woman whose idea it had been had formerly held herself aloof from the group, preferring her craft work to group activities. While preparing for the party she had to work closely with two or three other women. This experience gave her the opportunity to show initiative and to take a role of responsibility such as she had not done since her illness. Coverage necessary for the protection of the patients and the requisitioning of supplies were the only things provided by the staff. The role of an occupational therapy department in cases such as these changes from that of providing activities and hoping they will be of interest to the group to that of providing only the tools for the activities and letting the patients carry through their own ideas.

There are times when activities fail to be sufficiently stimulating to draw everyone into the group. When this situation arises, particular effort must be made to discover new interests. One of the most effective ways we have found to do this is to have a mass meeting for the entire active patient group. For these meetings to be successful it has been discovered that the part of the leader, who is usually a member of the occupational therapy staff, should be a very passive one. The usual procedure in these meetings is for the leader simply to state the problem at hand and to leave the rest of the meeting to the patients.



## OCCUPATIONAL THERAPY AT BUTLER HOSPITAL

It may be a question of what to do about the hospital publication or how to arrange for new people to get acquainted more easily. Patients express their ideas and opinions and plans for acting upon their suggestions seem to follow in a very easy fashion. If the discussions at the meetings get off the subject, as they are



apt to do, this freedom is allowed without interference. Legitimate complaints may be voiced and action may be taken. Results of these meetings up to the present time have been very satisfying in view of the number of new interests and ideas which have come from the patients through this medium. Their remarks concerning the meetings seem to indicate their expanding interest in taking an active part in initiating their own activities.

On one occasion we found it very natural and pleasant to call together for a discussion a small group of men and women who had shown little interest in activities. In the course of the conversation we found that three or four of them shared an interest in play productions. With this group as the nucleus, a larger group was formed by each of the original people getting two or three others interested in the idea. It was their own wish to have it a fairly impromptu performance in order to eliminate the necessity of numerous rehearsals. In order to include as many people as possible they decided upon a series of skits. Each of the ten or twelve people on the planning committee took over certain duties, one writing the continuity, another writing a mock radio quiz program, another gathering a chorus, and others working on lights, make-up and costuming. Rehearsing was done informally on the wards, the entire cast gathering only once or twice. The result was an evening of fun for all those

participating and of enjoyment for the large audience of patients and hospital personnel. Our aim was not a finished production; our aim was to draw those people into the group and to enable them to realize that they could again take initiative and leadership.

Our basic schedule at the present time includes a work or shop period in the morning and a variety of recreational activities in the afternoon and occasionally in the evening. In none of our activities, except gymnasium classes, is there any segregation of the men and women. It is chiefly in the area of the recreational activities that progress has been made toward active participation in a program which patients themselves have planned. It might be well to point out at this time that all occupational therapy at Butler is done on a prescription basis and regular reports are sent to the doctors. Weekly conferences with them have been established to coordinate our work with that of the doctor and thus better serve the patients' needs. Through these conferences we hope to gain the type of medical guidance which is so necessary to make occupational therapy an integral part of the patients' treatment. In the meetings the patient's behavior at activities is discussed with special emphasis on his social adjustment and evidence of spontaneity and initiative as well as discussion of any especially abnormal occurrence. The hope is that the psychiatrist may gain further insight into the patient's condition through this information, which may be quite different from that encountered in interviews or on the wards. We need instruction in the line of approach the doctor is using with the particular patient and only in this way can we support his work through finding an activity which will best help the patient in making the desired readjustment.

The aim of this type of occupational therapy is to "provide the individual with a capacity and a technique for a stable life in a real role in a real world." (\* p. 70)

1. Menninger, Karl, M.D., *Bulletin of the Menninger Clinic*, Vol. 10, No. 3, p. 65.
- \*2. Main, Lt. Col. T. F., R.A.M.C., "The Hospital as a Therapeutic Institution," *Bulletin of the Menninger Clinic*, Vol. 10, No. 3, p. 67.
3. Pascal, Gerald R., Introduction, *O.T. Report*, Butler Hospital, Providence, R. I., 1946.

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## People You Should Know



### BARBARA MARY STOW, M.A.O.T.

An almost interminable period of the disheartening realism of war has served to enthuse Barbara Mary Stow, M.A.O.T., all the more with the realization for the need to expand the application of occupational therapy in her native land of Great Britain.

Those of use who had the privilege of meeting Miss Stow during her three months' stay in the United States can little realize the hardships she has been obliged to surmount, for her friendly assurance and pleasant manner radiated at all times.

Last year's ultra-severe winter in England made it necessary for hospital authorities to make a prompt decision to bring all hospitals back to London. Every available space had to be utilized for reconstruction and rebuilding. Miss Stow was promised a new department in another location with three shops.

This program afforded her a period of free time and it was suggested that she visit the States while the work was carried out. St. Thomas authorities co-operated in arranging the trip and presented a request for financial assistance to the King Edward VII Fund, whose primary function is the assisting of voluntary hospitals. The Fund, in conjunction with the Joint Governors and Trustees of the Northcote Trust, acknowledged the importance of Miss Stow's mission and the value it might return to occupational therapy in Great Britain, and made available the necessary finances.

During her three months in this country, dating from September 13, she has visited many major centers of occupational therapy education and therapeutic application in such cities as Ithaca, Rochester, Marcy, Trenton, Toronto, Boston, Philadelphia, Chicago, In-

dianapolis, Cleveland, Milwaukee, Baltimore, Washington, New York and others. One of the highlights of her trip was attendance at the Coronado convention of the AOTA.

Miss Stow has asked us to express her appreciation for the hospitality of OT's in all parts of the country, which she states made it possible to travel much more extensively than would have been possible otherwise.

At the beginning of the war, Miss Stow became a member of the British Red Cross Society and the Civil Nursing Reserve, working in the wards of a London hospital during the "Blitz" days of 1940-41. After further service in a Mobile Ambulance Unit, later a First Aid Post, she entered training through the BRCS and completed it at the Upton Emergency Hospital in Cheshire.

Her first appointment was as occupational therapist to Sutton Emergency Hospital. From there, she was appointed to St. Thomas' Hospital in May 1944 to establish a department in the London hospital and also at the country branch, near Godalming. After a year, both departments had grown too large for one person to supervise both, and an assistant was appointed.

In less than four years, Miss Stow and her department were forced to move eight times. Each time, larger quarters and additional equipment were achieved, despite the fact that bombing raids were a predominant reason for the moves. After one particular raid, the department was bereft of its bathroom, window panes were shattered and replaced as it were by brown paper which waved in the wind, and power was completely cut off.

On another occasion, equipment and supplies were moved into a hut made available in London, and a week later a V-1 bomb fell on it and destroyed practically everything. Miss Stow and her assistant had to start all over again. All through these trying years, invaluable assistance was given by the Minister of Health who negotiated the loan of much equipment.

The hut, 72 feet long by 24 feet wide, is still in use. At one end is a patients' rest room, at the other a small shop for children. In the center area is a well-equipped workshop plus an office and store.

AJOT 1, 6, 1947

In London, the department is run almost entirely for out-patients, although there are some patients receiving occupational therapy in the wards that are open at St. Thomas. Most long term cases go immediately to Godalming where they are written up for occupational therapy in the usual way, and either work in the wards or in the department.

Miss Stow has returned to England with the best wishes of all A. O. T. A. members in the successful continuation and expansion of the work which she has so efficiently initiated at St. Thomas and its affiliate, at Godalming.

## EDITORIAL

### THE TRUTH ABOUT YOUR EDITORS

We don't like to admit it but we are deeply disturbed. Are we being discriminated against? We keep wondering—WOULD occupational therapists send material, penciled on flowered stationery, to other editors of other magazines? If they would, we want to tell them they shouldn't, that's all.

Most magazines have a full time editor or even several of them—THEY (we suspect) have beives of secretaries and flocks of stenographers who really might cope with the aforementioned method of presentation—but even so, they won't even TRY to! Out set-up is different—as a matter of fact, being just plain ordinary practicing occupational therapists, your editors don't even own a secretary and to make matters really bad, they themselves can hardly type at all!

Feature YOURSELF trying to answer an average of 80 letters a week along with your regular job—then add to this the anguish involved in filing, checking names, sending notices, getting verifications and permits—not to mention the primary business of obtaining, acknowledging, editing, re-typing, sorting and putting manuscripts and items into shape for the publisher before a deathly deadline, and you'll see what we mean. And remember, too, that re-write jobs have to be returned to the authors for approval and this involves further correspondence and more trips to the post office.

Actually, though, if there were 48 hours in a day we just wouldn't care because we really like

our work, but since we exert no noticeable control over the matter of hours, we are definitely Making Comments. We want people to read the squib on page 392 entitled "Contributions to AJOT."

And while we're at it, we'll be really difficult and bring up another problem. Only one of us is AN ARTIST—and every time a drawing reaches us done in colored crayon, pencil or fountain pen on wrapping paper or fancy stationery, you can guess who gets the job! Not without a fight, though, because we're still wirey—we have to be *convinced* the idea is good before we'll embark on the process of interpreting someone else's drawing, because we know that besides putting it down in black and white, we'll have to return it to the original artist for approval, write letters of discussion and comment, tie up packages and make trips to the post office!

All we ask is that before you start to make a drawing, you assume a sturdy stance, focus an alert eye, and closely observe a drawing in a book or magazine. Lo, it is a photograph of the original, and all the measurements are right there. The drawing was done with India ink and a drawing pen on 2 or 3-ply illustration board. The size of the lettering is in keeping with the rest of the drawing so when the whole thing was reduced the lettering is still legible. It's really easy if you once observe closely how it's done! When we are nice and rich we'd get an artist to do this work for you but it is really better if you can have it done right where YOU are so you can provide the proper steering.

If you are wondering why we bother with unstudied presentations we'll tell you that when the material is good and our time is short it is easier to do this than to write letters and then sit and wait for the U. S. Mail to come through from therapists who are too busy at that particular moment to be able to do anything about it. Another, and more obvious, reason is that we think any kind of writing by O.T.'s is an important contribution, and we believe that once they discover they can do it, they'll improve like mad as they do in everything else!

We want good material, whether copy or illustrations or photographs, and some of you know to what dastardly and dangerous lengths

we will go to get it—we even sacrifice our PRIDE sometimes and go out and BEG! But the truth is that if we are to serve as a vehicle (even though of the surrey type with fringe on top, sometimes) for the exchange of ideas, we have got to have either (a) more cooperation in the presentation of material from the membership who represent The Profession, or (2) more time to devote to putting their contributions into publishing form. The latter is out of the question right now so we've had to put the whole thing up to you. YOU know how TOUCHY O.T.'s are supposed to be—humor us a little so we'll have the strength to meet Our Challenge in Life—and for goodness sakes, don't let any other editors know you're an O.T. if you submit anything to THEM in other than proper form!

We want to make sure that those good therapists who have prepared their material thoughtfully and presented it in professional form know they shouldn't have read this—and another group who should have been excused in the beginning from reading it, is composed of the noble characters (and we *do* mean noble, because we've attended conventions ourselves) who, at our express request, sent in penciled notes about the activities at the Convention so we could get some of them into this issue.

## A Professional Textbook

Special attention is called to the new book "Occupational Therapy," one which all occupational therapists have wanted and needed for years. The fact that it satisfies expectation after so long a period of anticipation is due to the efforts of Helen Willard, Director of the Philadelphia School of Occupational Therapy, and Clare Spackman, Director of the Curative Workshop of the same school. It is to them that the profession is indebted for recognizing a basic need, for calling together an outstanding group of therapists to write about their specialties, and for making this material available to us in the form of a text and reference book of which we may be justly proud.

The book which is reviewed on page 400 is out of print but another issue will be available soon.



## President's Opening Address at the Twenty-Seventh Annual Convention

*Del Coronado, California—November 3, 1947*

It is indeed gratifying to see so many of our members assembled here in these beautiful surroundings. We could hardly expect as large attendance here on the West Coast as we had in Chicago last year. However, I know those of you who have travelled far, have done so out of genuine interest. Consequently we should have a stimulating and inspiring meeting.

Although you will learn through the chairman of the Standing Committees of the important work they have been doing during the last year, it becomes my pleasant duty to commend them for their interests and efforts in behalf of our profession and the service of occupational therapy.

In my capacity as President, I have tried to keep pace with current trends and to direct the affairs of the association in such a way as to coordinate the activities of your national office with the needs of the field and in line with those of allied professional groups.

In so doing, it is important that we consider well our professional goals and take careful sites. Occupational therapy has made a unique place for itself in the care of the sick and injured, within the organized hospital program, in community health programs of all sorts, and in the state and federal services. We have seen some of the professional services lose cast and be criticized by the medical profession because of pursuing individual interests to the point of excluding or neglecting professional obligations and the fundamental needs of the patient. The doctor rules the destiny of the patient and we must therefore be careful to maintain our standards and improve our practice in service to his patients.

Occupational therapy is now on the threshold of an extensive and phenomenal development in physical medicine and medical rehabilitation. We must proceed cautiously and make no mistakes if we are to contribute treatment service of value within these organized groups. It is a challenge and calls for research and study in the various fields of occupational therapy.

You will remember that a full program was outlined for our association last year and it has been accomplished to a high degree of satisfaction. It hasn't been without concerted effort and diligence on the part of our office staff, wise committee guidance, and individual sacrifice, that so much has been accomplished.

We should here review our progress in order that we may appreciate the committee reports which are to follow.

Following the study of association needs and the extensive surveys in the field of education in occupational therapy which were conducted by Miss Fish and Miss McNary, Miss Hurt, as the first full time Educational Field Secretary, has done a superb job in establishing a valid registration examination. Those of you who have worked with her know as I do, that what she accomplished in ten months would in terms of normal working hours have taken nearly twice that length of time. She was ably guided in the project by Dr. Hyman Brandt, a research analyst, as consultant. The expense of his services were not adequately anticipated and therefore reflect to some extent our financial needs for the future of the education program. Nevertheless, I can assure you that the investment has given to you a registration examination which, although not yet perfect, is sound and professionally effective.

During the last year four more courses in Occupational Therapy have been accredited by the Council on Medical Education of the American Medical Association, namely:

The University of Wisconsin  
College of St. Catherine  
College of Puget Sound  
Texas State College for Women

making a total now of 21 accredited courses. There are three more courses at Wayne University, University of Iowa and the University of Minnesota—which will warrant inspection within the next year or thereabouts. All of these schools have been filled to capacity and yet there is a great dearth of qualified occupational therapists. This is a very healthy pro-



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\*Mrs. Harriet Jones Tiebel, O.T.R.  
10 Ward Street  
Floral Park, N. Y.

### Fellows

Walter E. Barton, M.D., Superintendent  
Boston State Hospital  
591 Morton Street, Boston 24, Massachusetts

Mr. Everett Elwood, Secretary-Treasurer  
National Board of Medical Examiners  
225 South 15th Street, Philadelphia, Pennsylvania

George M. Piersol, M.D., Professor Medicine  
Graduate Hospital of the University of Pa.  
Philadelphia 46, Pa.

M. G. Westmoreland, M.D., Executive Secretary  
College of American Pathologists  
203 North Wabash Ave., Chicago 1, Ill.

Miss Catherine Worthingham  
Director of Technical Education  
National Foundation for Infantile Paralysis  
120 Broadway, New York 5, New York

### Board Members

Sister Jeanne Marie Bonnett, O.T.R.  
Director of Occupational Therapy  
The College of St. Catherine  
St. Paul 1, Minnesota

Miss Mabel H. Davis, O.T.R.  
Director of Occupational Therapy  
Veterans Administration Hospital  
North Little Rock, Arkansas

\*Miss G. Margaret Gleave, O.T.R.  
Executive Director  
Delaware Curative Workshop  
101 West 14th Street, Wilmington 41, Delaware

Miss Sue P. Hurt, O.T.R., Director  
Department of Occupational Therapy  
Washington University School of Medicine  
4567 Scott Avenue, St. Louis 10, Missouri

Miss H. Elizabeth Messick, O.T.R., Chief O.T. Branch  
Physical Medicine Consultants Division  
Office Surgeon General, Washington 25, D. C.

Miss Jane E. Myers, O.T.R., Chief, O.T.  
Department Medicine and Surgery, V.A.  
Washington 25, D.C.

\*Miss Beatrice D. Wade, O.T.R.  
Director of Occupational Therapy  
University of Illinois, College of Medicine  
1853 West Polk Street, Chicago 12, Illinois

Miss Elizabeth K. Wise, O.T.R.  
208 Albemarle Street  
Rochester, New York

### Honorary Board Members

Dr. William R. Dunton, Jr., M.D.  
33 North Symington Road  
Catonsville 18, Maryland

Goldwin W. Howland, M.B., F.R.C.P.  
326 Medical Arts Bldg.  
170 George St., Toronto, Canada

\*Member of Executive Committee

## A.O.T.A. Officers and Members of Executive Committee



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\*WINIFRED C. KAHMANN, O.T.R.



*First Vice President*  
\*MARJORIE FISH, O.T.R.



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\*MARGARET G. GLEAVE, O.T.R.

*Treasurer:* \*CLARE S. SPACKMAN, O.T.R.

*\*Member Executive Committee*

professional employment situation for the therapist, although it indicates that we are not yet meeting the O.T. personal demand for the rapidly expanding field of physical medicine. Furthermore, our psychiatric and tuberculosis hospitals are woefully understaffed.

I cannot leave the subject of examination and accrediting of courses without pausing to pay tribute to our friend and ally, formerly of the American Medical Association, Dr. Melvin G. Westmoreland. Dr. Westmoreland, long associated with the Council on Medical Education and Hospitals of the American Medical

Association, is now Executive Secretary of the American College of Clinical Pathologists, in which position we wish him all success. We trust, however, that we shall continue to have the benefit of his counsel as a Fellow on our Board of Managers.

The Association is fortunate, indeed, to have obtained the services of Miss Wilma L. West, as permanent Educational Field Secretary. As an assistant in the Occupational Therapy Section of the Office of the Surgeon General, Miss West gained valuable experience in the planning and the organization of the training pro-

grams which enabled us to meet the needs of occupational therapy in the Army. Last year she was the recipient of the Baruch Committee Scholarship, extended to this association, and took work for a Masters Degree here at the University of Southern California.

Under the Kellogg Foundation Grant we shall be able to continue our education program in part for this next year. This grant was made for a three year period—\$9,000 the first year, \$8,000 the next, and the last installment of \$7,000 recently has been received. This generous donation has launched us on a permanent program of education and Dr. Morris of the Kellogg Foundation has again expressed appreciative approval of our course to date, under Miss Hurt. However, it now becomes necessary for our association to make provision for the financial support of our Education Office in the future.

The Public Relations activities of our association have, I think, spoken for themselves. We were unfortunate to lose Mrs. Morris as chairman of this committee when her new husband took her off to Europe to live. Nevertheless, the Phoenix News Bureau produced the very fine "Occupational Therapy, a Pioneering Profession," of which 20,000 copies have been distributed and we trust rendered a real service to all of you. There have also been a number of fine magazine articles contributed by members.

A wave of enthusiasm and appreciation has swept in from the membership in gratitude for our magazine. The American Journal of Occupational Therapy.—It has been so ably managed by our O.T. editor—Charlotte Bone. It has been a masterful undertaking and has gained prestige for us in medical and allied professional circles. This fine publication has been accomplished only through great effort and personal sacrifice on the part of the editor. For the future the association must anticipate financial support to carry the magazine on. The section editors and state associations have aided tremendously in its success and to them we extend our sincere thanks. It is a continuous job requiring diligence as well as constant vigilance. The response for articles and news from many members is evidence of your appreciation.

The Research Committee under Miss Carlotta Welles has laid a solid foundation for important studies on which she will report to you. Our resources for research are practically negligible. Until such time as funds can be procured for research the progress will be slow. Nevertheless, advancement is being made. This sort of work is not immediately spectacular and can only be accomplished by persistent search for and study of our materials and records of experience. The urge and ability for work in research is not given to all of us. We are, therefore, fortunate to have placed this committee under Miss Welles' capable leadership.

Already we are appreciating the value of our Permanent Conference Committee. Mrs. Murphy, with the Southern California Association, directed by Miss Marian Davis as President, have proved the benefits of advanced conference planning.

This, my first year as your President, has been an inspiring one for me. Whatever progress has been made has been due to the whole hearted acceptance of the responsibilities which have been delegated to our Committees, the Board of Managers, the delegates, and the officers of the association. To these I would also add the efficient and willing services of your national office staff.

Our membership has increased a few over 400 in the last year, bringing the total to 2909. This is rapid growth and with a total now of 21 accredited courses (and 3 more potential ones in the near future) turning out graduates yearly, we can look forward to substantial support of our association activities.

We will need additional funds for research and scholarships. An extended program of service to members, to include a revised placement service, is desirable. This last year your national office has operated under the handicap of rising costs. We are consequently barely solvent, but I think you will agree with me that we have received full value of our dollar and our efforts.

For the association I wish to thank the officers, the Board of Management, the committees, the state associations, the delegates, and the members, for their fine cooperation and confidence.

## Extra-Curricular Activities at the Convention

As reported by Bertha Piper, Lucie Murphy,  
Marian Davis, Jane Merrill and others

At the opening session of the convention Marian Davis, President of the Southern California Association and Local Convention Committee Chairman, presented our president, Mrs. Kahmann, with a beautiful replica of a mission bell. From then on all sessions were brought to order with the melodious tones of the bell.

On Wednesday afternoon the members took off on a two-hour, twenty-two mile boat trip around San Diego Bay. Battleships, tankers, aircraft carriers, submarines and "interest spots" were explained along the way by Miss Elizabeth Stone of the Convention Bureau. Miss Stone, by the way, was practically adopted for the week! From over the loud speaker it was the voice of Edna-Ellen Bell (Washington) and the popular accordions of Jane Merrill (Massachusetts) and Sue Hurt (Missouri) which added to the festivities.

One hundred and ten occupational therapists—and Connie's swell Ray—were on board. Incidentally, Mr. K's foot almost had to be left behind—it was caught in the side of the boat. Some O.T.'s, after a serious conference, removed the shoe and all was well. We should add that the one hundred and tenth O.T.—Elsie Geerts (Southern California)—almost missed the boat. Fortunately she was in excellent condition—her spectacular fifty-foot run and magnificent four foot leap from dock to starboard was made with such gazelle-like grace that it brought forth a salvo of spontaneous approval from the crowd.

It was fortunate that Bea Wade (Illinois) arrived early for the boat trip. She spent 15 minutes searching through her purse (an O.T.'s purse is more difficult than the average one, isn't it?) for the ticket she had purchased the day before. The search was both fruitless and unnecessary—her attractive new hair-do did the trick we are sure, for she was aboard—and we saw her talking with the captain.

Roody's (Southern California) ability to handle her crutches proves that an O.T. can practice what she preaches, and do anything and go anywhere. Don't think she missed a thing!

School luncheons were held en masse in the spacious Crown Dining Room. Smaller replicas of Connie's mission bell decorated each table, and later mailing cartons were provided each school so that the attractive mementos of the convention could be sent back home. As at all the special events, the flowers were breathtaking—hibiscus and bougainvillea made beautiful centerpieces. The musical atmosphere was enhanced by the accordion accompaniments performed by maestros Sue Hurt and Jane Merrill. The latter, with nineteen other B.S.O.T.ers, saluted their state with a dignified song about it being the home of the cod and the baked bean!

Colonel James A. Mattison, U. S. Army, Retired, who gave the welcome at the banquet, attended the San Francisco Convention twenty-two years ago. We were happy, too, to meet his gracious wife who is a former O.T.

Girls, remember Dr. Metheney and her slogan "F.P.T.—M.F.P." (For those who remained at home, this means, "Feet under pelvis, pelvis under trunk—means fine posture." Don't zig and don't zag—in other words, DON'T SAG!

Some lucky girls had an added treat on the trip from Los Angeles to San Diego. Barbara Stow (England), Clare Spackman (Pennsylvania) and Wilma West (New York) were guests for dinner on The Sea Wolf, Carlotta Welles' (Southern California) motor sailer, at Balboa Island.

We feel honored that Barbara Stow, Director of Occupational Therapy at St. Thomas' Hospital, London, England, was able to attend our convention. We believe she is a good "sample" and we look forward to seeing other members from across the sea.

Esther Pyun, Director of Occupational Therapy at Queen's Hospital, Honolulu, represented the Hawaiian Association. She very simply made a lovely lei from the petals of the beautiful bougainvillea around the hotel. She wore it with a dress of matching color and pattern at the banquet and looked charming.

Clare Spackman was so enthralled with California climate we wonder if she ever did arrive back at P.S.O.T. The first inkling that she was experiencing a reaction was when, at the end

of a Delegates Meeting, she said, "Please say Aye by raising the right hand."

Margaret Gleave (Delaware) and Isabel March (Illinois) rented a convertible one day and picked up Esther Pyun, Ella Fay (Illinois) and Dor Flint (Missouri) and took them on a "surprise drive." They said "No questions asked" so we don't know what they did—your guess is as good as ours!

The sessions did take up most of our time so it wasn't unusual for the gals to dash to the outdoor pool when meetings adjourned. All the same, imagine Lucie Murphy's (Wisconsin) surprise when she leapt out immediately following a session and found the two speakers there ahead of her!

Margaret Gleave decided that after Schools and Curriculum had been too prolonged and strenuous she should have a recess so she donned dungarees and went out to the briny deep with her poppy—where she met another school in a quieter spot!

After the convention Connie and Ray Kahmann, Willie West, Roody and Lucie Murphy went homesteading in the desert near Adama Marie Bower's cottage at Meringo Valley, California. *We* can't see how they had the energy to *pioneer* further after all they did at the convention!

Lucille Tuttle Rosenthal appeared as the self-appointed California Chamber of Commerce, with her personally conducted tours to nearby points of interest. For a girl who has been a resident of California for only five months, she accomplished more than a native could ever hope to do.

All of those bracelets, bangles and trinkets became part of the well-dressed O.T.'s accessories following the excursion to Tijuana. Incidentally, Lucie is an expert—after being taken at Tijuana on a bracelet-necklace-earring combination, she had to "pass" on the contemplated purchases of her companions on subsequent trips.

We are interested to know what happened to Willie West the day she wore that good looking red suit. She simply wouldn't put it on again.

Overheard—

Sue Hurt: I love traveling by plane—it's so reliable!

Connie Kahmann: Has anyone seen Ray?

Willie West: Oh sleep it is a blessed thing!

Isabel March: Discrimination!

Henrietta McNary: But everything I bought was so reasonably priced!

The World War II Song and the Civilian Song went the rounds. Brilliant gems that they were, we are sorry to be able to include both of them now but we reserve space in a future Journal for the W. W. II number.

#### O.T. SONG FOR CIVILIANS

They float through the wards with the greatest of ease,  
The "civies," the beauties, the bestest O.T.'s.

Their baskets are graceful, all the patients to please,  
And the doctors they've stolen away.

Oh, their weaving, their knitting, their cross stitching,  
too,

Oh, their printing and mending with glue!

They're the darlings, the best of the gals in the field  
And to them the M.D.'s all will yield—oh!

*Sung to the tune of The Daring Young Man  
on the Flying Trapeze*

We cannot praise too highly the work of the Exhibit Committee headed by Marilyn Quint. Nora Reseaff planned the arrangement. This was the hardest working committee at the convention. All agreed it gave us a wealth of material. Thanks also to those O.T.'s who volunteered help both in putting up the exhibit and in packing it at the close of the convention. We all hope Marilyn had a good rest on her Northern vacation.

The bulges and contented looks on your delegates are due to the excellent food which they all ate with such relish. When desserts were so good, one just had to have two!

Praise and thanks to Brentwood U. S. Veterans Hospital and Mr. Charles Fry who made the guideposts and El Canieno real bells which marked the school tables at the luncheon. These decorations were a distinct hit with everyone—they were beautiful both in construction and design. (New England wishes to report back that the cacti around the base of their post are still living and have blossomed!—Ed.)

To Ethel Sanford for her luncheon and banquet arrangements, and Edith Berdie for the Tea and Sunday Party arrangements—many thanks! All West Coast O.T.'s were hostesses at the social events and helped to make it a "fun" convention. We doubt if we will ever forget the bonfire and lanterns at the Cocktail Party!

The American Plan of the Hotel del Coro-



# 1947 ANNUAL CONVENTION

nado and the informal atmosphere made this a friendly convention. We all went away on speaking terms with association members from coast to coast.

The 30th Anniversary Convention of the A.O.T.A. is over. It was marvelous from beginning to end, and as usual in California—the weather was perfect!

## Who Did You See At The Convention?



## COMMITTEE REPORTS

### REPORT OF THE COMMITTEE ON RESEARCH AND SCIENTIFIC STUDY\*

The current plans of this committee were presented to the Board of Management in March, 1947, and outlined in the April issue of the American Journal of Occupational Therapy. Since then specific projects have begun by the subcommittee. This report is concerned only with progress to date.

1. The committee on general and physical function under the chairmanship of Miss N. Meryl Van Vlack is assembling material for a manual of adapted equipment. In collaboration with World War II occupational therapists letters were written to all present and former directors of occupational therapy in military hospitals, inviting their help in preparing material on special equipment which they have used or developed. The delegates were also asked to outline the project to the state associations and submit to Miss Van Vlack a list of individual therapists who would subsequently offer material. Since then considerable material has been received. This is now being redrawn by an architectural drawing artist, working in cooperation with the committee. When an adequate number of pages has been prepared they will be submitted to a review board and then to a publisher. The publication will be in the form of punched, looseleaf pages which may be added to, from time to time.

The committee wishes to express its appreciation and thanks to delegates, directors of military occupational therapy departments and individuals who have helped or contributed to the manual. More material is needed, however, and should be sent to Miss Van Vlack.

2. The subcommittee on neuropsychiatry under the guidance of Mrs. Elsa Hill outlined and began a very ambitious program which was presented in the August issue of the American Journal of Occupational Therapy. As the work developed, it became apparent that a tremendous amount of work would be necessary if the program as outlined were to be completed. Mrs. Hill has just assumed new responsibilities as director of occupational therapy at Mills College and has felt it necessary to resign as chairman of this committee. We are particularly grateful for her vision and en-

thusiasm for real research and we are very pleased that she will maintain her active interest in this committee.

We are delighted that Miss Bertha Piper, Director of Occupational Therapy at the Fairfield State Hospital in Newton, Connecticut, has been persuaded to accept the chairmanship. Her steady and enthusiastic interest, not only in neuropsychiatry, but in the American Occupational Therapy Association, has been an inspiration to those of us who have been privileged to work with her. We look forward to something of practical value which will develop from the work of this committee.

3. Since the board meeting in March, some question has arisen regarding the specific functions of this committee as distinguished from those of the subcommittee on graduate study. A meeting was held, consisting of the educational field secretary, the chairmen of the subcommittee on schools and curriculums, the subcommittee on graduate study and the research and scientific study committee. Pending the decisions of the committee on Rules and Procedures it was agreed that the committee on graduate study should be concerned with study leading to higher degrees and with special intensive courses offered by schools and universities. It was further agreed that the Research and Scientific Study Committee should be concerned with special research projects which may be done in a hospital and with graduate clinical training affiliations.

If this committee is to function as outlined, it is suggested that the title "Research and Scientific Study Committee" is redundant and not descriptive of its function. Real research is a very difficult undertaking. We do not know enough about how to do it and we do not have time or funds with which to do much of it. Nevertheless, the profession can make a very real contribution to itself by undertaking together some definite and possible study projects.

It was suggested that consideration be given to changing the title to "Clinical Research and Service Committee."

Respectfully submitted,  
Carlotta Welles, O.T.R., Chairman

\*The Board of Management acted immediately to change the name of this committee to "Clinical Research and Service Committee."

## American Occupational Therapy Association

## BALANCE SHEET

at

August 31, 1947

Exhibit "A"

## ASSETS

	Total	General Fund	Educational Fund	Endowment Fund	Public Relations Fund
Cash in bank	\$ 4,052.40	\$ 2,055.96	\$ 360.54	\$ 1,635.90	\$ —
Investments:	16,600.00	—	—	16,600.00	—
U. S. Government Bonds	\$2,499.67	—	—	—	—
Office furniture and fixtures	158.83	—	—	—	—
Less—Reserve for depreciation	<u>\$2,340.84</u>	2,053.96	286.88	—	—
Deferred charges:					
Deposit on lease	220.42	220.42	—	—	—
Yearbooks, handbooks and reprints	2,783.44	2,783.44	—	—	—
<b>TOTAL ASSETS</b>	<u>\$25,997.10</u>	<u>\$ 7,113.78</u>	<u>\$ 647.42</u>	<u>\$18,235.90</u>	<u>\$ —</u>

## LIABILITIES AND SURPLUS

Accounts payable:					
Purchase creditors	\$ 1,416.03	\$ 1,402.78	\$ 13.25	\$ —	\$ —
Social security taxes	26.92	18.12	8.80	—	—
Income tax withheld	349.80	240.20	109.60	—	—
<b>TOTAL LIABILITIES</b>	<u>\$ 1,792.75</u>	<u>\$ 1,661.10</u>	<u>\$ 131.65</u>	<u>\$ —</u>	<u>\$ —</u>
Surplus:					
Balance—September 1, 1946	\$37,495.41	\$17,952.07	\$1,477.91	\$17,065.43	\$1,000.00
Add:					
Excess of income over expense for year ended August 31, 1947 (Exhibit "B")	13,291.06	12,499.39	962.14	1,170.47	1,000.00
Balance—August 1, 1947	<u>\$24,204.35</u>	<u>\$ 5,452.68</u>	<u>\$ 515.77</u>	<u>\$18,235.90</u>	<u>\$ —</u>
<b>TOTAL LIABILITIES AND SURPLUS</b>	<u>\$25,997.10</u>	<u>\$ 7,113.78</u>	<u>\$ 647.42</u>	<u>\$18,235.90</u>	<u>\$ —</u>

# TREASURER'S ANNUAL REPORT

## Exhibit "B"

### STATEMENT OF INCOME AND EXPENSE For the Fiscal Year Ended August 31, 1947

GENERAL FUND			
INCOME		EXPENSES	
Members' dues .....	\$14,809.50	Service expenses (Schedule B-1):	
Registration fees .....	10,071.50	Administration .....	1,666.03
Examination fees .....	3,800.00	Educational publicity .....	5,301.59
Subscriptions to		Placement .....	2,251.43
O.T. & R. ....	25.00	Publications .....	11,452.86
Subscriptions to		Registration and	
A.J.O.T. ....	444.65	membership .....	9,006.73
Volunteer course .....	82.15	Examinations .....	5,761.67
Sales:		Service for	
Literature .....	\$1,414.14	committees .....	5,162.97
O.T. insignia:		Cooperation with	
Regular .....	997.35	other agencies .....	60.09
Cuts .....	39.00		<u>40,603.28</u>
Students .....	.45		
O.T. pins .....	210.50	Material purchased	
Year book—single		for resale:	
copies .....	141.59	Literature .....	\$2,766.79
Year book—advtg.	693.41	Less—reprints and	
Baruch Fellowship		handbooks on	
Scholarship .....	2,500.00	hand Aug. 31,	
Donations—General .....	210.00	1947 .....	1,266.22
Miscellaneous—sale			<u>1,500.57</u>
of furniture .....	24.50	O.T. insignia .....	406.15
TOTAL INCOME	<u>\$35,463.74</u>	O.T. pins .....	266.00
			<u>2,172.72</u>
		Scholarship (Baruch	
		Fellowship Fund) ..	2,500.00
		Appropriated to Public	
		Relations Fund ....	2,627.04
		TOTAL EXPENSE	<u>\$47,963.13</u>
EXCESS OF INCOME			
OVER EXPENSE—			
Transferred to Surplus	<u>—\$12,499.39</u>		

EDUCATIONAL FUND							
INCOME			EXPENSES				
	Total	Regular	Special		Total	Regular	Special
Grant from W. K.				Salaries .....	6,953.76	6,953.76	—
Kellogg Foundation ..	\$8,000.00	\$8,000.00		Travel .....	230.62	230.62	—
Bridgeport Workshop—				Office expense:			
Survey .....	50.00	50.00		Rent .....	780.00	780.00	—
Anonymous contribution	1,000.00		1,000.00	Telephone .....	318.69	318.69	—
TOTAL INCOME	<u>9,050.00</u>	<u>8,050.00</u>	<u>1,000.00</u>	Stationery—office supp.	311.83	311.83	—
				Postage and express ..	128.27	128.27	—
				Printing .....	793.51	591.89	201.62
				Auditing .....	65.00	65.00	—
				Office repairs .....	76.63	76.63	—
				Payroll taxes .....	329.96	329.96	—
				Depreciation of furni-			
				ture and fixtures ..	2.73	2.73	—
				Miscellaneous .....	21.14	21.14	—
EXCESS OF INCOME				TOTAL EXPENSES	<u>10,012.14</u>	<u>9,810.52</u>	<u>201.62</u>
OVER EXPENSES—							
Transferred to Sur-							
plus .....	<u>—\$962.14</u>	<u>—\$1,760.52</u>	<u>\$ 798.38</u>				

# TREASURER'S ANNUAL REPORT

## ENDOWMENT FUND

### INCOME

Donation—Estate of K. Root . . . .	\$ 575.00
Interest on U. S. Treasury Bonds . . . .	497.99
Interest on bank balance . . . . .	8.35
Profit on sale of U. S. Treasury Bonds . . . . .	89.13

### INCOME FOR YEAR —

Transferred to Surplus . . . . .	\$1,170.47
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## PUBLIC RELATIONS FUND

### INCOME

Appropriation from General Fund . . . .	\$2,627.04
Donation—Mrs. Dave H. Morris, Jr. . . . .	100.00
<b>TOTAL INCOME</b> . . . . .	<b>2,727.04</b>

### EXPENSES

Service charges (Phoenix News Co.) . . . .	\$2,083.35
Booklet . . . . .	936.65
Multigraphing, etc. . . . .	526.74
Miscellaneous expenses . . . . .	180.30

<b>TOTAL EXPENSES</b> . . . . .	<b>3,727.04</b>
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### EXCESS OF INCOME OVER

### EXPENSES — Transferred to

Surplus . . . . .	— \$1,000.00
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### Schedule B-1

## DETAILS OF SERVICE EXPENSES

### ADMINISTRATION:

Payroll . . . . .	\$1,161.34
General service expense (10%) . . . . .	504.69
	\$1,666.03

### EDUCATIONAL PUBLICITY:

Payroll . . . . .	1,161.74
Exhibit . . . . .	27.53
Printing . . . . .	5.87
Year book—50% of expense . . . . .	3,097.07
General service expense (20%) . . . . .	1,009.38
	5,301.59

### PLACEMENT SERVICE:

Payroll . . . . .	1,741.68
Printing . . . . .	3.06
Miscellaneous . . . . .	2.00
General service expense (10%) . . . . .	504.69
	2,251.43

### PUBLICATIONS:

O.T. & R. . . . .	158.00
Payroll . . . . .	1,161.34
Newsletter . . . . .	788.52
A.J.O.T.—expense . . . . .	1,005.11
A.J.O.T.—subscriptions . . . . .	7,585.20
Legal . . . . .	250.00
General service expense (10%) . . . . .	504.69
	11,452.86

### REGISTRATION AND MEMBERSHIP:

Payroll . . . . .	2,903.42
Printing . . . . .	329.53
Postage . . . . .	354.94
Year book—50% of expense . . . . .	3,097.07
Certificates . . . . .	288.81
Miscellaneous . . . . .	14.17
General service expense (40%) . . . . .	2,018.79
	9,006.73

## For the Fiscal Year Ended August 31, 1947

### EXAMINATIONS:

Payroll . . . . .	626.77
Printing . . . . .	615.36
Postage . . . . .	204.64
Express . . . . .	46.70
Telephone and telegraph . . . . .	66.69
Correcting papers . . . . .	509.60
Service fees . . . . .	2,272.00
Traveling . . . . .	1,230.27
Scoring papers . . . . .	44.50
Miscellaneous . . . . .	145.14
	5,761.67

### SERVICE FOR COMMITTEES:

Payroll . . . . .	\$2,901.68
Traveling . . . . .	591.62
Printing . . . . .	321.25
Annual meeting . . . . .	299.18
Institute meeting . . . . .	267.91
Miscellaneous . . . . .	276.64
General service expense (10%) . . . . .	504.69
	\$5,162.97

### GENERAL SERVICE AND OFFICE EXPENSE

Rent and light . . . . .	1,865.04
Telephone and telegraph . . . . .	571.32
Auditing . . . . .	90.00
Depreciation . . . . .	156.10
Bonding . . . . .	15.00
Stencil . . . . .	105.78
Office supplies . . . . .	994.13
Postage . . . . .	377.85
Payroll taxes . . . . .	529.26
Miscellaneous . . . . .	342.45

5,046.93

Less amount distributed to services (as above) . . . . .

5,046.93

**TOTAL—Exhibit "B-1" . . . . . \$40,603.28**



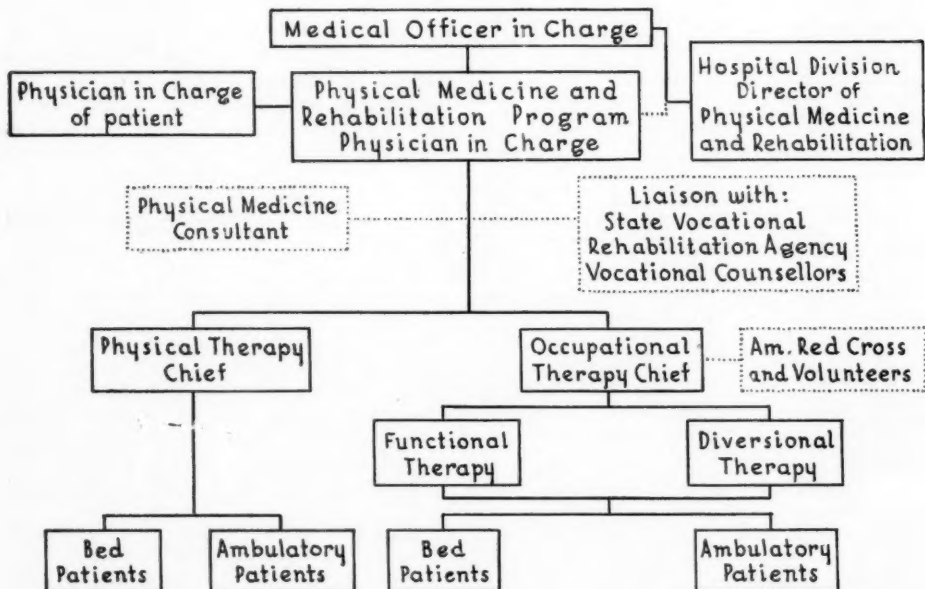
SPECIAL GROUPS

FEDERAL SECURITY AGENCY, U. S. PUBLIC HEALTH SERVICE

A. William Reggio, M.D., Editor

ORGANIZATION CHART

Physical Medicine and Rehabilitation Department  
U.S. Marine Hospital



Professional status has been approved and authorized for all qualified occupational therapists in the U. S. Public Health Service.

The conversion from sub-professional to professional will take a little time as individual "job descriptions" will have to be reviewed in order to allocate the professional grade appropriate to the position held.

The grades P-1, P-2 and P-3 for field positions will be for occupational therapists qualified to fill the positions but the sub-professional grades for occupational therapy aides will not be abandoned as such positions will still be needed.

When the final regulations are ready they will be announced.

Arrangements have been made for the training of medical officers in physical medicine preparatory to developing a more effective pro-

gram of physical and occupational therapy for the rehabilitation of its legal beneficiaries. Those volunteering must have had at least four years intensive clinical work in preparation for their specialty boards. Upon successful completion of the course, officers will be assigned to Marine Hospitals in charge of programs of physical and occupational therapy. Initially the training will consist of a six months course at the Massachusetts General Hospital in the Department of Physical Medicine.

The course will be both theoretical and practical and will include orientation through study of the basic principles underlying physical and occupational therapy, training in techniques, supervised practice in the use of apparatus and the application of methods and techniques, instruction in writing prescriptions for treatment, etc. Trainees will participate in the day to day work of rehabilitation clinics.

## PAST OFFICERS HONORED

The N.Y.S.A.O.T. opened its season with a well attended dinner meeting October 28, at which Mrs. Meta Cobb, O.T.R., retiring Executive Secretary of the A.O.T.A., and Mr. Holland Hudson, retiring Treasurer of the A.O.T.A., were especially honored.

Since Mrs. Cobb was unable to attend the National Convention in California, it was decided to present her with a gift from the members of the A.O.T.A. at this meeting. Mrs. Harriet Tiebel, O.T.R., spoke appreciatively of the Secretary's efforts through the years, and gave her a silver cigarette case with an acorn design raised on the cover, and the following inscription engraved inside:

"To Meta Rupp Cobb, with gratitude and affection from members of the American Occupational Therapy Association. October, 1947."

The case contained a check for \$275. Mrs. Cobb found it hard to express her appreciation and said that her heart would be with the members always, remembering the great friendships she had made throughout the country.

Miss Marjorie Fish, O.T.R., spoke of Mr. Hudson's capable handling of the treasury for six years and complimented him for keeping the A.O.T.A. in the black. She then presented him with four record albums of classical music and a double record cabinet for his collection, as a gift from the members of A.O.T.A.

The resignation of Miss Marjorie Fish, O.T.R., as President of the New York State Association of Occupational Therapists, effective October 29th, 1947, was regretfully accepted by the Board of Managers. Miss Susan Colston Wilson, O.T.R., succeeds Miss Fish.

Dr. William Rush Dunton, Jr., Editor Emeritus of O.T. & R., was called out of town at the last minute so he was unable to attend the October meeting of the Maryland Occupational Therapy Society at which that group had planned to present him with a token of appreciation from the A.O.T.A. membership. A member of the state society therefore called later at his home to give him the love and best wishes of the entire A.O.T.A., and at the same time presented him with a leather wallet containing a handsome check.

AJOT I, 6, 1947

## DELEGATES DIVISION

Miss Bertha J. Piper, O.T.R., Editor

### HAWAII

Esther Pyun, O.T.R., Delegate-Reporter

The Occupational Therapy Association of Hawaii has regular bi-monthly general meetings planned for the interests of therapists, volunteers, and guests by a Program Committee; monthly Board of Management meetings, and one annual general meeting usually held in March.

A review of the meetings for this year will give a picture of the activities of the Association, and an idea of the projects which interest our group. Incidentally, we always welcome vacationing mainland therapists at our hospitals and have had the pleasure of introducing several of them to our members at general meetings this summer.

The January meeting was held at the Honolulu Academy of Arts. Mrs. Jean Fanning, Instructor of Pottery at the Academy, not only talked on ceramics but had a number of interesting displays of various types of ceramic pieces, and each member was given a piece of clay for a creative pinch-bowl project. The ceramic activities of the Academy and the opportunity it affords therapists in this area made the afternoon's program a most valuable one. Fond "Alohas" with orchid corsages were expressed to departing Frances Taber, Secretary-Treasurer for 1946, and Mrs. James Witten (nee Marion Ballou) who served as Calendar Chairman for the year.

The annual meeting in March was a luncheon meeting held at luxurious Queen's Surf overlooking the blue Pacific framed by coconut palms—an ideal tropical setting! The guest speaker, Dr. R. N. Hatt, orthopedist from Shriner's Hospital, assured the group of his deep-founded interest and his support of the plan for a Curative Workshop in Honolulu, its need and place in the community. This project is one which the Association is interested in promoting.

The May meeting at Queen's Hospital was for the purpose of introducing Committee chairmen for the year, and giving each an opportunity to outline her tentative plans.

The July meeting was held at the Territorial Hospital, Kaneohe. During the luncheon, Dr.

## DELEGATES DIVISION

Guensberg, Medical Director of the Hospital, welcomed the group. Miss Lorraine Massa, Scholarship Loan student, was honored with a traditional lei. A graduate of the U. of Hawaii, Miss Massa, with the aid of the Association, will begin her O.T. studies this year at the Boston School of Occupational Therapy. Miss Hall, Chief Therapist at Kaneohe, conducted the members and their guests on a tour of the Hospital located on windward Oahu under the sheltering wall of the steep Koolau Range.

The September meeting was held in the Board of Health basement. Miss Catherine Nourse, Consultant in Occupational Therapy for the Bureau of Crippled Children under the Board of Health, gave an informative talk which was followed by a movie on Cerebral Palsy. Miss Nourse recently returned from a four-months' course at Dr. Phelps' School in Baltimore, and is in charge of the newly opened Cerebral Palsy Clinic in Honolulu.

In November, a joint meeting was held with the Physical Therapy Association.

**Public Relations.** The Association is represented on the Oahu Health Council of Social Agencies, and the Honolulu Chapter of the National Vocational Guidance Association. Our active participation as a community organization keeps us currently informed on activities of these various associated groups. Publicity Chairman, Mrs. Elizabeth Huntsberry, therapist at Leahi Hospital, has continued the education program in the high schools and the University of Hawaii. In this connection, we are always eager to pass out brochures from occupational therapy schools on the mainland. A highlight of our publicity program began when K.P.O.A., local radio station, donated fifteen minutes once a month to our Association. Using this excellent means of informing the general public about occupational therapy, radio talks included activities at the various hospitals as explained by chief therapists, and an interview series with prospective O.T. students. Mrs. Dowsett gave an informative series on early beginnings of occupational therapy in the Islands, and its increased program during the war years.

**Money-raising.** The Association's annual money-raising project for a Scholarship Loan Fund is given impetus at this time of year.

This fund annually enables an Island girl to go to the Mainland to study occupational therapy. As attractive O.T. calendars arrive from the press, they are assembled, tied, and packaged. Many mainlanders interested in promoting our Scholarship Fund have distributed these calendars for us. Another "project" that is going to help an Island girl obtain a professional education on the mainland as an occupational therapist, is a painting by Mrs. Lillie Gay Torrey. Five years ago the artist was struck by the beauty of a blooming poinsettia and captured that beauty on canvas in flame reds and greens. The painting, on display in the window of Grossman-Moody, Ltd., in September, has been generously donated by the artist to the Occupational Therapy Association of Hawaii.

### OFFICERS

President, Mrs. Gertrude McKinney, O.T.R., Chief Therapist, 26th Station Hospital, 197 U. S. Army.  
Vice-President, Miss Ellin White, O.T.R., Chief Therapist, St. Francis Hospital, Honolulu, T. H.  
Secretary, Miss Alyce G. Milne, O.T.R., Therapist, Queen's Hospital, Honolulu.  
Treasurer, Miss Ellen Kim, Therapist, Queen's Hospital, Honolulu.

### ACKNOWLEDGMENT

One of the best general information articles to have been written about occupational therapy has been provided by Alison Carr for the Career Section of the magazine *Seventeen*. "Career for Hands . . . and Hearts" in the October issue offers invaluable reading for anyone who is interested in making a career of this profession. It is of equal value to those who wish to interpret the profession to lay persons or to others in allied fields. We recommend it on all counts and feel that occupational therapy has been fortunate to have been so understandingly interpreted with such a breadth of factual information.

### CONTRIBUTIONS TO A-JOT

Manuscripts for articles and special divisions should be typewritten double-spaced. Footnotes and bibliographies should be presented in this order: name of author, article title, name of periodical with volume, page, and month. Drawings should be clear, distinct, finished, and done in black on white. Photographs should be clear and distinct. Above should be sent to Editor, *American Journal of Occupational Therapy*, Garden Suite, 64 Commonwealth Avenue, Boston 16.

## SPECIAL NOTICES

### NATIONAL REGISTRATION EXAMINATION

The Educational Office announces that the next national registration Examination will be held on February 27, 1948. The schools which supervise these examinations will receive further details well in advance of this date.

### REFUND OF REGISTRATION EXAMINATION FEE

Refunds are allowed only if the applicant notifies the Office of the Educational Field Secretary of withdrawal at least two weeks prior to the examination date.

### SCHOOLS AND DIRECTORS OF CLINICAL TRAINING

The Subcommittee on Clinical Training will soon have available for distribution to all schools and clinical training directors:

Outline of Essentials of Clinical Training Program  
Director's Manual  
Rater's Guide  
Interpretational Key for Report Forms

### NOTICE TO CLINICAL TRAINING DIRECTORS

Relative to the national registration examination, occupational therapy schools are required to submit reports concerning applicants' rating and duration of affiliation in each field. Clinical training directors whose departments provide services to two or more fields (such as general and pediatric, psychiatric and tuberculous) are urged therefore to make out in triplicate, a separate report for the student's work in each field. One of these National Clinical Training Report Forms will be retained by the director. Of the two forms which will be returned to the school, one will be retained by the school and the other will be forwarded to the Educational Office.

These report forms may be obtained from the schools, or directors may purchase extra copies (\$1.50 per hundred) from the Office of the Educational Field Secretary, American Occupational Therapy Association, 33 West 42nd Street, New York 18, New York.

AJOT 1, 6, 1947

### TO THE MEMBERS OF THE AMERICAN OCCUPATIONAL THERAPY ASSOCIATION

Dear Members:

Since my message sent to the meeting in California was heard only by those present, I wish to express herewith my sincere thanks and appreciation to *all* members in grateful acknowledgment of their wonderful gift.

I had already been amply rewarded by the friendships which I shall never cease to value.

Our cause is vital and each day more important. I shall always be with you in spirit.

Faithfully yours,  
(Mrs.) Meta R. Cobb, O.T.R.  
Executive Secretary

### DIRECTORS OF O.T. DEPARTMENTS

The Registration Committee of the A.O.T.A. is preparing a skills survey of every institution which has an O.T. department. The survey stems from the need to correlate activities curricula in schools with the activities used as treatment media by O.T. departments, and is in relation to the Registration Examination.

The survey will provide an opportunity for every director to participate in the guidance of the trend of treatment media. The results of the survey doubtless will have direct bearing on the future of O.T. in general for it is probable that some subjects will be deleted and others added to the school programs which are preparing prospective occupational therapists.

### A THANK YOU NOTE TO THE CONVENTION COMMITTEE

Those of us who traveled to the West Coast for the Convention expected great things. If there is something more descriptive than great things, it was what we had at Coronado. Not only the ideal weather, not only the beautiful scenery, but the very best in everything was ours from the cocktail party to the last item on the program. It was all done with a spirit of cordiality and warm friendship which we like to believe is typical of every occupational therapist. Things were so well organized and the mechanics so well hidden we were as impressed by the efficiency of California O.T.'s as we were by their state. May it be possible for us to return to California soon!

### APPOINTMENTS ANNOUNCED

The Board of Management of the American Occupational Therapy Association announces the appointment of Miss Wilma L. West, O.T.R., as Executive Director of the Association. She will continue to fulfill the duties of Educational Field Secretary.

Approval has been given also for the employment of an Assistant Director whose primary duties will be public relations and placement.

### MEERHOF CHILDREN'S HOSPITAL

Meerhof is on the shores of the Hartbeestpoortdam, near Pretoria, South Africa. There are accommodations for 52 boys and girls between the ages of 3 and 19. The main types of cases are rheumatic and other diseases of the heart, chronic rheumatism causing bone deformities, certain types of bone tuberculosis and spastic paralysis (without mental defect). Connected with it is a special school run by the Transvaal Education Department, which the patients attend.

There is no resident medical staff but there is a nursing staff of eleven, a teaching staff of three, and about twenty African employees. The hon. medical staff and physiotherapists visit the hospital regularly twice a week.

Because the post of occupational therapist is newly created here, it will be necessary for the therapist to start the center from scratch. The salary is £300 per annum, on the scale £300 x 20—440 plus cost of living allowance of £40 per annum. It will be necessary for the officer to live in at Meerhof, for which a charge of £10 per month for board and lodging will be made.

Interested therapists should apply to Secretary of the Board, Jacqueline Hoogeneljk, Meerhof Children's Hospital, P. O. Box 383, Pretoria, South Africa.

### OPENINGS FOR O.T.'s IN MARYLAND

The State of Maryland recently made known the existence of openings for occupational therapists and assistant occupational therapists in various state hospitals. The former, according to the Standard Salary Scale, receive \$2,000-\$2,500 plus full maintenance. Liberal vacation, sick leave and retirement benefits are also mentioned.

### SPECIAL NOTICES

### BOARD OF MANAGEMENT MEETING

March 20-22

St. Louis, Missouri

### ONE ARMED TYPEWRITER

International Business Machines has developed an Electromatic Typewriter for one-armed persons. A specially designed keyboard for either the right or left hand gives ample speed and ease of operation. L.M.W.

### INSTITUTE FOR THE CRIPPLED AND DISABLED

400 First Avenue at 23rd Street, New York  
announces

### A TRAINING COURSE IN CEREBRAL PALSY THERAPY

For: Physical Therapists and Occupational Therapists

Registration: February 10, 7:00-8:00 P.M. 8th Floor of the Institute

Dates: Every Tuesday Evening, 7:00-9:00 for 10 weeks beginning February 17

Place: The Institute (as above)

Fee: \$15.00

Requirements: Occupational Therapists—registration, Physical Therapists—registration plus A.P.A. membership.

In Charge: Miss Elizabeth Addoms, Head of Physical Therapy Training at New York University.

Instructors: Miss Addoms and two R.P.T.T.'s from the Institute, plus special lecturers.

Certificate: Certificate of attendance given; no academic credit.

### COUNCIL FOR EXCEPTIONAL CHILDREN

The International Council for Exceptional Children is holding its Twenty-fourth Annual Convention in Des Moines, Iowa, from April 25 to April 28, 1948.

Convention headquarters will be at Hotel Fort Des Moines. The International Council for Exceptional Children is composed of educators and social workers interested in the problems of the handicapped child.

Individuals interested in attending this convention should make their reservations early by writing to

Mrs. Betty Whitford  
629 Third Street  
Des Moines, Iowa

AJOT I, 6, 1947



## Do You Know That . . .

The following services are available under the State-Federal partnership in vocational rehabilitation:

1. Medical examination—to determine eligibility, to reveal work capacity, to indicate rehabilitation services needed, to discover hidden disabilities. This is free.
2. Medical, surgical, psychiatric and hospital care, as needed—to remove or reduce the disability. These services may be purchased with public funds to the extent of the client's inability to pay.
3. Counsel and guidance—to assist the handicapped person to select and attain the right job objective. This is free.
4. Artificial devices—limbs, trusses, hearing aids, etc., as necessary—to increase the capacity for work. These may be purchased as above.
5. Training—to enable the client to learn to do the right job well. This training may be given in high schools, vocational schools, special schools, colleges, on-the-job, by correspondence or even by tutor, as necessary. Training is free.
6. Placement on the right job—the one which the client has chosen with good counseling, the one for which he has been physically and mentally prepared, and the one which he can do well. Placement is free.
7. Transportation and maintenance during rehabilitation—as necessary. This is free to the extent the client cannot pay.
8. Customary tools, licenses and equipment—whatever is needed to do the right job right. These are free to the extent the client cannot pay.
9. Follow-up—to make sure the rehabilitated person makes good. This is free.

### DOCTOR DONALD COVALT

Dr. Donald A. Covalt, Head of the Veterans Administration Rehabilitation Service since its establishment in December, 1945, has been appointed Associate Professor in the new Department of Rehabilitation and Physical Medicine at New York University College of Medicine, and Head of the Rehabilitation Institute of the new New York University—Bellevue Medical Center. In so doing he is rejoining his wartime "boss," Dr. Howard A. Rusk. The

success of Dr. Covalt's leadership in the cause of rehabilitation is well known.

### VICE PRESIDENT OF A.O.T.A. GOES TO AUSTRALIA

Miss Marjorie Fish, O.T.R., First Vice President of the American Occupational Therapy Association and Director of Training Courses at Columbia University, has been extended a leave of absence to go to Australia where she will succeed Miss Sylvia Docker from England as Director of the Occupational Therapy Training Center at Sydney.

Miss Docker has held this position since the inception of the Center early in World War II. The Center, sponsored and controlled by the Australian Association of Occupational Therapy, is affiliated with the University of Sydney for some of its instruction but is not a part of that institution.

Miss Fish sailed out of San Francisco on December 12 on the S.S. Marine Phoenix and expects to reach Sydney on January 9. Her address will be: Sydney Training Center, 539 Elizabeth Street, Sydney, Australia.

### HOLLAND HUDSON HONORED

Dr. Henry H. Kessler and Holland Hudson were named as the persons who have contributed most toward the aid of the physically handicapped by the National Rehabilitation Association at its Annual Convention in Chicago in October.

### N.S.C.C.A. ANNUAL CONVENTION

Representatives of the National Society for Crippled Children and Adults, with its more than two thousand member units in the United States, Alaska and Hawaii, attended an Annual Convention of three days, November 3 through 5. The convention had for its theme, "The Handicapped—A Great National Resource."

Convention speakers included Dr. George B. Stoddard, President of the University of Illinois, speaking on the educational aspects of rehabilitating the handicapped; Dr. Ray Carhart, of Northwestern University, on oral rehabilitation; Dr. David Slight, Professor of Psychology, University of Chicago, on the psychological aspects of rehabilitation and Dr. Meyer A. Perlstein, authority on cerebral palsy

and Chairman of the Medical Advisory Board at Michael Reese Nursery School, Chicago.

Other speakers were Dr. Arnold Gessell, Director of the Clinic of Child Development, Yale University; Dr. George Deaver, Professor of Physical Medicine at New York University's Bellevue Hospital; and Dr. Howard A. Rusk, Associate Editor of the *New York Times* and Chairman of the Department of Rehabilitation and Physical Medicine of New York University.

One whole day of the meeting was devoted to new knowledge about cerebral palsy, a condition as prevalent as polio but about which little is known. Dr. Winthrop M. Phelps, medical director of the Children's Rehabilitation Institute, Cockeysville, Maryland, stated that, since 1920, research has disclosed that only 30 per cent of cerebral palsy victims are mentally deficient, while the remaining 70 per cent are capable of very marked improvement, both physically and mentally. Treatment for these cases involves education of other portions of the brain to take over control functions.

Demonstrations by persons cerebral palsied from birth, or in whom the condition resulted from injuries received later, showed abilities learned through this type of treatment. Children buttoned clothes, spelled with block letters and walked between parallel bars while one young woman rode a bicycle, as she does daily to work.

#### POSTGRADUATE COURSE IN PHYSICAL MEDICINE

University of Texas Medical School  
Galveston, Texas, March 1-5, 1948

The Course is designed for the general practitioner and specialist interested in the more effective use of physical medicine. It will include instruction in the theory and technic of application of the various agents, and will thus emphasize the practical, clinical aspects of physical medicine as well as the more recent developments in this expanding field. A number of live demonstrations and motion pictures will be given in addition to the didactic presentations.

Among those participating in the program are many national and international authorities, including Drs. Robert L. Bennett, Emory

University and Georgia Warm Springs Foundation; Donald A. Covalt, New York University; Frederick A. Jostes, Washington University; Frederick T. Jung, American Medical Association; Worley Kendell, University of Illinois; A. B. C. Knudson, Veterans Administration, Washington, D. C.; Richard Kovacs, New York Polyclinic Medical School; Frank Krusen, Mayo Clinic; John Kuitert, Fitzsimons General Hospital; Stafford Osborne, Northwestern University; and Arthur White, Percy Jones General Hospital. Members of the staff of the University of Texas and other Texas institutions will also participate.

There will be a general fee of \$25.00 to cover instruction, and an additional \$2.00 fee for those desiring certification of attendance at the course. *Open to all physicians and qualified physical and occupational therapy technicians.*

For further information regarding the course, write to Dr. Truman Blocker, Director of Postgraduate Training Courses or Dr. W. A. Selle, Professor of Physiology, Director of Postgraduate Course in Physical Medicine, University of Texas—Medical Branch, Galveston, Texas.

#### DR. H. WORLEY KENDALL

Dr. H. Worley Kendell, Professor of Physical Medicine at the University of Illinois Medical School, was inducted as president of the American Congress of Physical Medicine at the Annual Meeting of that group in September. In his presidential address he stressed the importance of coordination of occupational and physical therapy services in the care of the patient.

A joint educational committee composed of members of the Congress, the American Physiotherapy Association and the American Occupational Therapy Association is being formed to foster the advancement of education among the groups.

#### COL. VOGEL APPOINTED

Colonel Emma Vogel, long-time head of Army physical therapists, has received appointment as head of the Women's Medical Specialist Corps which is comprised of an Occupational Therapy Section, a Physical Therapy Section and a Dietitian Section.

## Sanding for Exercise

By MARGARET L. BLODGETT, O.T.R.

*In Charge of Occupational Therapy, U. S. Marine Hospital, Boston, Massachusetts*

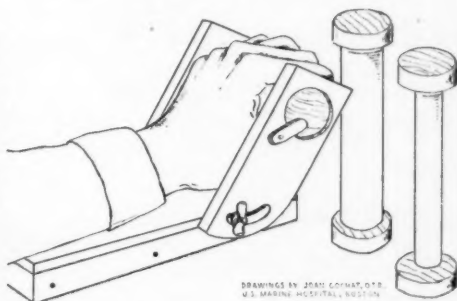
In the last few years considerable controversy has arisen in the field regarding the merits of various types of sandblocks. In fact, the whole question of the value of sandpapering as a treatment has been questioned. The main criticism has arisen from the fact that many of the existing sandblocks fail to provide active motion, resulting rather in a holding position which greatly limits their usefulness.

Aside from this fact, there are other disadvantages inherent in this type of treatment. It is generally conceded that in itself sanding is apt to be extremely boring and should be used only for short periods between other and more interesting forms of activity. Danger lies also in the fact that it requires little or no preparation, is less strain on the budget than other projects, and is apt to be used to excess by the therapist who is either too busy or not ingenious enough to provide more interesting occupations.

Though fully aware of these criticisms, we believe that sandblocks CAN be so designed and used as to be a valuable adjunct to other forms of treatment. The sandblock illustrated here was built in answer to our own needs, mainly for the purpose of increasing dorsiflexion of the wrist. We found it particularly useful for cases of arthritis, where active motion is so essential, and where forced motion can so easily prove disastrous. We have also used it to good advantage for Colles fractures, and for contractures due to burns.

The main feature of this block is that when properly used it provides active motion. Since there are no straps to hold either the forearm or the wrist in place, it is essential that constant supervision be maintained, and that the patient cooperates to the fullest extent.

To adjust the block for use, the handle within the patient's range of motion is selected and the upright adjusted to the limit of his dorsiflexion, secured firmly by means of the wing bolts on the side. As the patient grasps the handle and pushes the block away from him, his arm drops



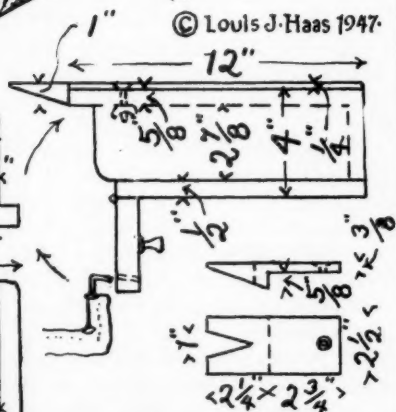
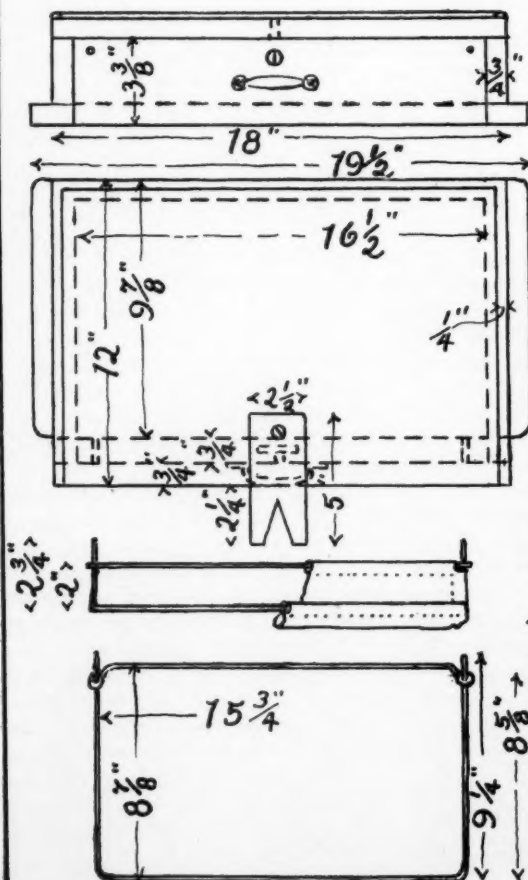
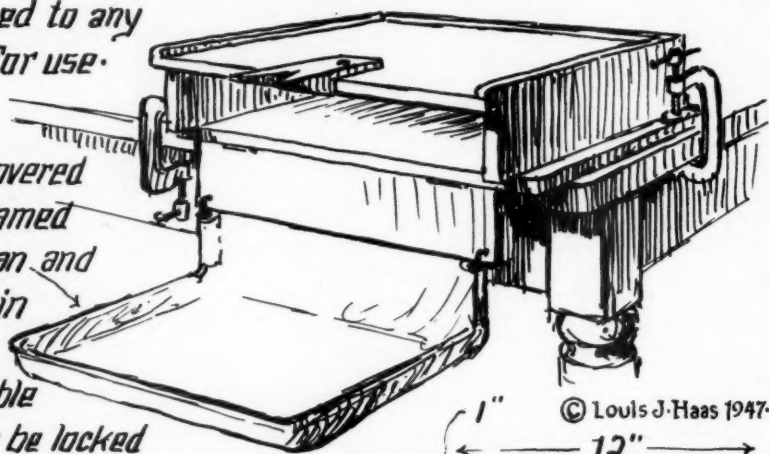
DRAWINGS BY JONAS COHNAT, O.T.R.  
U.S. MARINE HOSPITAL, BOSTON

to the support of the block, and by his own power he forces his wrist into a position of dorsiflexion, partly by his effort to use his flexor muscles, and partly by the weight of his arm. Then as he pulls the block back, toward himself, his wrist leaves the block and returns to a neutral position, only his grasp on the handle remaining. Active motion occurs to the limit of his range of motion, and with the wrist in a position of dorsiflexion, grasp is also increased. Care must be taken that the wrist returns to its neutral position with each stroke, otherwise only a holding position is obtained and the whole advantage of the block is lost. As motion is increased, the upright is advanced toward a 90 degree angle, thus greatly encouraging the patient.

The handles are of graduated size, are readily interchangeable, and allow for an increase in metacarpal, phalangeal, proximal, and distal flexion. Fine or coarse sandpaper provides some slight increase in resistance, but the patient himself may increase the resistance by the force he uses on the forward stroke, and by how hard he bears down on the board. Both the handles and the upright are so easily and quickly adjustable that the block may be used for several patients in succession with little or no loss of time. The best results are obtained when the block is used on a wide, flat surface, as it lacks stability when used on a narrow edge, or on a curved surface.

*A Small Portable Jewelry Bench* This bench can be clamped to any table for use.

The cloth covered wire framed filing pan and filing pin are removable and can be locked



with tools and materials in the bench. This bench all of pine or with a maple top is easily home made. It can be used in a one room apartment and kept when not in use in a bureau drawer.

Bench can be carried and used to demonstrate Jewelry making in camps clubs or classes having no shop facilities.



## A Small Portable Jewelry Bench

By LEWIS J. HAAS, F.A.A., O.T.R.

*Director Men's Therapeutic Occupations, New York Hospital, Westchester Division, White Plains, New York*

Many psychiatric patients become interested in handicraft for the first time in their lives while receiving prescribed treatment in the occupational department of the hospital. This interest, coupled with the insight gained during convalescence, prepares him for the physician's suggestion that wholesome handicraft hobbies can help stabilize recovery. Patients preparing to leave the hospital therefore frequently ask the therapist for assistance in planning home hobby shops. If the therapist can aid the patient to plan ways of carrying on his hobby regardless of space limitations a lasting contribution to the stabilization of mental health has been made.

The present rapidly growing interest of patients in small metal work and especially jewelry has recently inspired the designing of a work bench that can effectively serve even under the most drastic floor space limitations. The portable jewelry bench shown in the working drawing is made entirely of pine or with a top of maple, and it can be supported by a kitchenette table, a table-height bureau or even a small end table. Several layers of newspaper should be laid over the top of the furniture and folded around the edge before the portable bench is placed upon it. For perfect protection against damage a piece of wood (which can receive the direct pressure of the clamps) should be placed beneath the paper that is folded around the overhanging edge of the furniture.

It will be noted that the removable filing tray is a wire frame covered with muslin. The filing pin, held in place with a bolt and wing nut, can be removed and with the filing tray, placed with the tools and materials within the bench. When the hinged front has been closed and locked the bench can be carried by the handle and placed in a bureau drawer when not in use.

The construction has been planned so simply that anyone who can use a saw, hammer, nails and screws can build his own portable jewelry bench. With such a bench, equipped with a limited number of carefully selected tools,

small projects in Art Metal Work and a full program of handicraft fine costume jewelry can be made under the severest limitations and most temporary floor space. It is planned to print the working drawing of the bench and a specially selected list of tools upon a single sheet that will be available to patients interested in establishing a personal hobby shop.

### HOLIDAY WINDOWS

Decorating holiday windows at St. Louis Children's Hospital provides fun for both patients and volunteer workers. It is an easy method, requiring little or no native talent, and the results are festive and entertaining.

Choose a picture or motif from a greeting card or an illustration and place it in a balopticon. Focus this to the desired size on paper which has been taped to the opposite wall. Outline the pattern on the paper with pencil and it is ready to contribute a holiday atmosphere to a hospital ward. Center the pattern on a window so it is visible through one side of the glass, and secure it with mending or scotch tape. Patients, volunteer workers or occupational therapists fill in the design with color on the glass before the paper is removed. This method is particularly effective on partition windows which must be seen on both sides.

Show card colors are the most desirable from the standpoint of both safety and economy since they are fire-proof and respond quickly to soap and water. The colors are dripless and opaque when mixed to the consistency of heavy cream.

The traditional American holidays are nurtured and projected again and again in this manner at our hospital. The preparation and completion of the Holiday Windows are anticipated with pleasure and they do much to educate and enliven the patients.

Clorilda Brown, O.T.R.

To retard slightly the setting rate of plaster of Paris, add flour paste or starch after the plaster and water have been mixed.



## LETTERS

Dear Editor:

I believe that it is healthy to have constructive criticism brought to our attention so we may see ourselves as others see us, take our work less for granted, and begin to do some thinking to correct the situation. All of us struggle for adequate terms which will describe occupational therapy so that its ramifications will be defined and so that its contributions to the medical and social fields may be more clearly realized.

A publication of the Social Science Research Council which bears the title "Adjustment to Physical Handicap and Illness: A Survey of the Social Psychology of Physique and Disability" presents some challenging statements concerning O.T. On page 264 the authors, R. G. Barker, B. A. Wright and M. R. Gonick, state: "To the authors the chief weakness of the occupational therapy movement is its failure to develop an adequate rationale for its program. It has offered neither objective proof of its effectiveness nor a theoretical basis for its procedures. Here is an example of the impracticability of being too immediately and completely practical. Such slogans as 'If the hands and feet are busy the mind will be untroubled and content' and 'Work is the natural state of man' can hardly be expected to impress many today. On the other hand, recent developments in the understanding of play and projective techniques, of counseling, and of personality and emotion would appear to provide excellent beginnings for an effective psychology of occupational therapy. There is every reason to believe that it is possible to begin to define the conditions benefited by superficial motor activities, passive diversion, primitive free play, emotional cathartic activities, prevocational activities, therapeutic counseling, group activities, etc."

As individual therapists most of us have found it necessary to develop a rationale for our work and have done so. Our shortcoming is not in continuing without a rationale, but in failing to express it. . . .

There is a certain amount of resistance to the more basic concept of O.T. because, particularly from the administrative point of view, the older concept is often more immediately practical. Laymen who lack time, energy or interest are too easily satisfied with the more superficial concept. However, we are the only ones who can remedy the situation. We should seize and use wisely every opportunity for research—and should publish the results. We should realize and admit our limitations as well as our assets, discuss our rationale among ourselves and with members of associated professions, and express this rationale at every opportunity, even though time and effort are required to do so. This Journal can serve as a most appropriate vehicle for these expressions.

ANTJE PRICE, O.T.R.

## BOOK REVIEWS

*Principles of Occupational Therapy* edited by HELEN S. WILLARD, B.A., O.T.R., Director, Philadelphia School of Occupational Therapy, and CLARE S. SPACKMAN, B.S., M.S., O.T.R., Director, Curative Workshop, Philadelphia School of Occupational Therapy, and Director, Occupational Therapy Department, Hospital of the Graduate School of Medicine, University of Pennsylvania, Assistant Director, Philadelphia School of Occupational Therapy. Published by J. B. Lippincott Company, Philadelphia, London, Montreal. Price in the U. S. A.—\$4.50.

The loud cry in the Occupational Therapy profession has been that there were no Occupational Therapy textbooks. Here, at last, is the book, worthy of the consideration of every registered therapist and student. It will be an invaluable aid also to doctors, nurses, physical therapists, and social service workers in their attempt to analyze and utilize Occupational Therapy.

In the first five chapters, the broader aspects of the entire profession are considered: "The History and Development of Occupational Therapy"; "The Scope of Occupational Therapy"; "Educational Aims in Occupational Therapy"; "Activities in Occupational Therapy"; and "Factors in the Organization of Occupational Therapy Departments." It does not seem possible that anyone who is training students or who is interested in developing her own department or who wants accessible printed material for educating the public can afford to miss owning this book.

Following the opening chapters, the details of these fields are developed: mental illnesses, pediatrics, physical injuries including cerebral palsy and arthritis, general medicine and surgery, tuberculosis, and visual handicaps. In these areas, some of the items that are found are the types of treatment for specific diagnoses; how to measure joints and methods of recording; types of prescriptions; patient approach; adaptability of activities; and departmental records. All the accompanying illustrations are excellent and easy to comprehend. In fact, the many things that therapists have wanted to see in print are there.

The closing chapters are concerned with the Occupational Therapy and Rehabilitation programs in the Army, the Navy, and the Veterans Administration. These point out very well the development and the great impetus of the profession during World War II.

Every Occupational Therapist will be greatly indebted to the many authors of this book for their outstanding work. It will be interesting to watch the growth of each of these chapters into a separate textbook. J.M.

### REPRINTS AVAILABLE

The following reprints may be obtained at a cost of 15 cents each from the American Physiotherapy Association, 1790 Broadway, New York 19, New York.

*Care of Patients with Infantile Paralysis: Correlation on the Nursing and Physical Therapy Services* by Carmelita Calderood Hearst.

Occupational therapists who experience difficulty in correlating their treatment programs with those of the other hospital services so that the patient may receive maximum benefit from each, will find some helpful suggestions in this article.

*Mental Hygiene Program for the Cerebral Palsied Child* by Grizzelle M. Norfleet, A.B., B.S., M.A.

This program has as its foundation the six basic drives and the article contains suggestions regarding procedures for meeting these drives. It is an excellent summary and will serve as a reminder to the occupational therapists of the points to be observed when working with these patients.

*The Prescription of Physical Therapy* by Jessie Wright, M.D.

We suggest that this reprint will be of value and of particular interest to occupational therapists in the functional field. The introduction and the closing paragraph, and the portions dealing with relaxation, clinical-pathological relations, exercise and protective body mechanics, contain information applicable to occupational therapy. *Physical Therapy and Chest Surgery* by Florence S. Linduff.

This contains an excellent outline of chest conditions which require surgery, the surgical procedures for them and the physiotherapy program. Occupational therapists whose physician prescribes graded functional treatment will find it invaluable.

*Physical Therapy in Orthopedics: with Special Reference to Heavy Resistance, Low Repetition Exercise Program* by Dorothy G. Hoag.

This is a brief description of the exercises developed by Thomas DeLorme, M.D., and the procedures for carrying them out. It contains also a discussion by Donald L. Rose, M.D.

*The American Physiotherapy Association Directory of Members—1946.*

### BOOKS

*SCIENCE & SEIZURES—NEW LIGHT ON EPILEPSY AND MIGRAINE* by WM. G. LENNOX, M.D. Published in 1941 and brought up to date in 1946, this book is for the layman an enlightening neutralizer of fear and superstition, and for the non-specialist physician a guide to diagnosis and treatment. 240 pages.

*CONVULSIVE SEIZURES—HOW TO DEAL WITH THEM* by TRACY J. PUTNAM, M.D. Published in 1943, second edition 1945, this book has brought hope to thousands through its non-technical explanation of what

the doctors know about epilepsy and of what the epileptic can do. 140 pages.

*EPILEPSIA*, the Journal of the International League Against Epilepsy is published annually by the American Epilepsy League. The 1946 issue of 160 names comprises a ready reference to new publications on Epilepsy throughout the world. A limited supply is available to professional persons at the price of \$1.00 per copy.

### EPILEPSY

The American Epilepsy League, Inc., has as its purpose the development of a consciousness and understanding of epilepsy, its social, medical and educational implications. The following publications may be obtained from them at 50 State Street, Boston 9, Massachusetts. Pamphlets \$.10 each, books \$2.00 each, 10% discount on orders of 100 or more.

#### PAMPHLETS AND REPRINTS

*WOMAN WITHOUT FEAR* by HERBERT YAHRAES. About a courageous woman who surmounted epilepsy through use of the newer treatment, and who now leads a busy public life as well as a normal private one. Reprint *Woman's Home Companion*, February, 1945.

*THE EPILEPTIC—WHO IS HE—WHAT HE CAN BE* by WM. G. LENNOX, M.D. A brief but comprehensive statement justifying the epileptic's right to a normal life. Reprint from the *Journal of Rehabilitation*, September, 1945.

*MARRIAGE AND CHILDREN FOR THE EPILEPTIC* by WM. G. LENNOX, M.D. Sets forth that normal family life is possible for a majority of epileptics receiving suitable treatment. Reprint from the *Journal of Human Fertility*, December, 1945.

*TREATMENT OF EPILEPSY* by H. HOUSTON MERRITT, M.D. Very helpful both to physicians and laymen who want a brief clear statement of what constitutes the best professional knowledge of medication of epilepsy today. Reprint from the *Cincinnati Journal of Medicine*, 1946.

*NEWER AGENTS IN THE TREATMENT OF EPILEPSY* by WM. G. LENNOX, M.D. This forward looking paper opens with "Epilepsy is slowly emerging from the dog house of professional bewilderment and defeat." It goes on to sketch briefly what is now known and employed in diagnosis and treatment, and what the pressing needs are to bring this malady under full control. Reprint from the *Journal of Pediatrics*, September, 1946.

*MESANTOIN—NEW DRUG IN THE TREATMENT OF EPILEPSY* by HARRY S. KOZOL, M.D. A report on the results of treating with Mesantoin approximately 100 patients who had not responded favorably to previously used medications. Reprint from the *Journal of Psychiatry*, September, 1946.

**EPILEPSY IN CHILDREN**  
**BUILDING A FUTURE FOR THE EPILEPTIC CHILD**  
 by MRS. BROOKS POTTER. Reprint from *The Crippled Child*, October, 1947.  
**MANAGEMENT OF THE CONVULSIVE CHILD** by  
 CHARLES BRADLEY, M.D. A comprehensive paper dealing not only with the medication of the patient, but with the problems of social adjustment. Reprint from the *Rhode Island Medical Journal*, November, 1946.

**VETERANS WITH EPILEPSY**  
**THE EPILEPTIC VETERAN COMES HOME.** A plea for facing facts and giving the Epileptic Veteran a

chance. Published by American Epilepsy League, Inc.  
**WHAT'S GOING TO HAPPEN TO ME?** by HERBERT YAHRAES. Written for the Veterans in whom seizures have been precipitated either by wounds or strain, this folder consists of questions and answers every epileptic and his family should read. Published by the American Epilepsy League, Inc. July, 1946.

**EMPLOYMENT**  
**THE EMPLOYMENT OF EPILEPTICS** by Wm. G. LENNOX, M.D. and STANLEY COBB, M.D. A forthright statement concerning the capacities and limitations of epileptics. Revised 1945.

## INDEX—Volume I, 1947

February	1-68	June	137-204	October	273-338
April	69-136	August	205-272	December	339-404

### INDEX ACCORDING TO SUBJECT OF TITLE

- Administrative Aspects of an Occupational Therapy Department, Some ... 233  
 Donald W. Cordes
- Ambulation, Early ..... 222  
 N. O. Calloway, M.D. and others
- Amputees, Occupational Therapy with  
 Filipino ..... 92  
 Elizabeth Nachod, O.T.R.
- Aphasic's World, A Glimpse into an .... 361  
 Eleanor T. Albertson, O.T.R.
- Army, The Future of Occupational Therapy  
 in the ..... 25, 89, 155  
 H. Elizabeth Messick, O.T.R., Wilma L. West,  
 O.T.R.
- Army, Let's Look to the ..... 302  
 Winifred C. Kahmann, O.T.R.
- Army, New Women's Medical Specialist  
 Corps in the ..... 298  
 H. Elizabeth Messick, O.T.R.
- Aural Rehabilitation, Occupational  
 Therapy in ..... 293  
 Nancy F. Brown, O.T.R.
- Blinded, Help for the Newly ..... 27  
 Mary Dranga Campbell
- Blindness, Considerations for the Preven-  
 tion of ..... 348  
 Evelyn M. Carpenter
- Cerebral Palsied Child, Exploring the  
 Problems of the ..... 226  
 Report of The Children's Bureau
- Clinical Views Occupational Therapy,  
 The State Hospital ..... 295  
 Elvin V. Semrad, M.D.
- Curare and Its Effect on Arthritis ..... 352  
 Elizabeth Collins, O.T.R.
- DEAF**  
 291 The Educational Program of Congen-  
 itally Deaf Children  
 293 Occupational Therapy in Aural Re-  
 habilitation
- Educational Program of Congenitally  
 Deaf Children, The ..... 291  
 Helen Schick Lane, Ph.D.
- Emotions, Human—and Their Bearing on  
 Tuberculosis ..... 205  
 Emeline Place Hayward, M.D.
- Employment for the Disabled in Britain 166  
 John Hall
- Ergography, The Application of—to Disa-  
 bility Evaluation ..... 73  
 F. A. Hellebrandt, M.D. and Helen V. Skowlund
- Escape from Nonsense ..... 145  
 Holland Hudson
- Finger Painting in an Occupational Ther-  
 apy Program ..... 358  
 Peter J. Napoli, Ed. D., and Beatrice E. Gold,  
 O.T.R.
- General Hospital, Occupational Therapy  
 in a ..... 285  
 Harry H. Samberg, M.D.
- Geriatrics and Occupational Therapy .... 159  
 Grace C. Hildenbrand, O.T.R.
- Imbecile, Methods and Techniques Used  
 in O.T. for the ..... 137  
 Mariella Menzel

- Librarian Speaks, The Hospital ..... 354  
Helen Becker
- Measurement, Joint ..... 209, 281  
Sue P. Hurt, O.T.R.
- Medical Rehabilitation in Veterans Administration, Coordination in ..... 168  
Horace Spaulding
- Mental Hygiene Approach to the Handicapped Child, The ..... 215  
William M. Cruickshank, Ph.D.
- Muscle Function, Considerations in—and Their Application to Disability Evaluation and Treatment ..... 69  
Sue P. Hurt, O.T.R.

# **MUSCLE FUNCTION AND DISABILITY EVALUATION**

- 69 Considerations in Muscle Function
- 73 The Application of Ergography to Disability Evaluation
- 209, 281 Joint Measurement
- 285 Occupational Therapy in a General Hospital
- 000 Tendon Transplants of the Hand and Their Treatment in O.T.
- Music, There Is a "Reach" to ..... 95  
Bertha J. Piper, O.T.R. and Mrs. B. S. Winchester
- Occupational Therapy, A Psychiatric Treatment ..... 1  
Alfred P. Solomon, M.D.
- Occupational Therapy, A Point of View 164  
Barbara B. Stimson, M.D.
- Occupational Therapy and Rehabilitation in Europe ..... 30  
Sally Emlen, O.T.R.
- Occupational Therapy in Civilian Dress 79  
Clare S. Spackman, O.T.R.
- Occupational Therapy, Some Functions of—Military and Civilian ..... 86  
Nathaniel Warner, M.D.

# **ORGANIZATION AND ADMINISTRATION**

- 79 Occupational Therapy in Civilian Dress
- 233 Some Administrative Aspects of an O.T. Department
- 285 Occupational Therapy in a General Hospital
- Paraplegics, A Program for ..... 22  
Margaret S. Rood, O.T.R.
- Paraplegics, An Occupational Therapy Aid for ..... 148  
Edward W. Lowman, M.D., and Fred Liphum

- Part of the Whole, A ..... 82  
Hart E. Van Riper, M.D.
- Pediatrics, Occupational Therapy in .... 276  
Henry G. Poncher, M.D., and Julius B. Richmond, M.D.

# **PEDIATRICS**

- 215 Mental Hygiene Approach to the Handicapped Child
- 226 Report: Exploring the Problem of the Cerebral Palsied Child
- 229 Sanitarium Care for the Rheumatic Child
- 276 Occupational Therapy in Pediatrics
- 291 The Educational Program of Congenitally Deaf Children

- Physical Therapy ..... 273  
Mildred Elson
- Prevocational Activities for the Physically Handicapped ..... 152  
Caroline Goss Thompson, O.T.R.
- Poliomyelitis, The Over-all Treatment of 365  
Edward W. Lowman, M.D.

# **PSYCHIATRIC**

- 1 Occupational Therapy, A Psychiatric Treatment
- 95 There Is A "Reach" To Music
- 295 The State Hospital Clinician Views Occupational Therapy  
Finger Painting In An Occupational Therapy Program

# **PSYCHOLOGICAL**

- 86 Some Functions of Occupational Therapy, Military and Civilian
- 164 Occupational Therapy — A Point of View
- 205 Human Emotions and Their Bearing on Tuberculosis
- 215 The Mental Hygiene Approach to the Handicapped Child
- Red Cross Arts and Skills in Hospital Rehabilitation ..... 83  
Edward W. Lowman, M.D.
- Registered, How Shall Occupational Therapists Be ..... 18  
Hyman Brandt, Ph.D.
- Rehabilitation Therapy In A Sanatorium 10  
A. N. Aitken, M.D.
- Rehabilitation—What Is It? ..... 149  
A. William Reggio, M.D.

## REHABILITATION

- 10 Rehabilitation Therapy In a Sanatorium
- 30 Occupational Therapy and Rehabilitation in Europe
- 83 Red Cross Arts and Skills In Hospital Rehabilitation
- 149 Rehabilitation—What Is It?
- 161 Next Step—A Suitable Job
- 166 Employment For The Disabled in Britain
- 168 Coordination In Medical Rehabilitation in Veterans Administration
- 293 Occupational Therapy In Aural Rehabilitation
- 300 — And So To Work
- Rheumatic Child, Sanatorium Care for .. 229  
Robert A. Black, M.D.
- State Association Programs ..... 157  
Susan S. Barnes, O.T.R.
- Suitable Job, Next Step—A ..... 161  
Jean McNary
- Tendon Transplants Of The Hand And Their Treatment In Occupational Therapy ..... 339  
Mary Schroder, O.T.R.

## TUBERCULOSIS

- 10 Rehabilitation Therapy In A Sanatorium
- 145 Escape From Nonsense
- 205 Human Emotions And Their Bearing On Tuberculosis

## VOCATIONAL COUNSELOR

- 161 Next Step—A Suitable Job
- Work,—And So To ..... 300  
Kathleen Courlander
- Women's Medical Specialist Corps, The New ..... 298  
H. Elizabeth Messick, O.T.R.

## PERSONALITIES

- Cobb, Meta R., O.T.R. .... 171
- Fish, Marjorie, O.T.R. .... 101
- Hudson, Holland ..... 170
- Hurt, Sue P., O.T.R. .... 99
- Kahmann, Winifred C., O.T.R. .... 32
- McNary, Henrietta, O.T.R. .... 100
- Messick, H. Elizabeth, O.T.R. .... 172
- Morse, Lucy G., O.T.R. .... 104, 267
- Reilly, Mary, O.T.R. .... 33

- Sommer, Emmy, O.T.R. .... 304
- Stow, Barbara Mary, M.A.O.T. .... 376
- Taylor, Marjorie, O.T.R. .... 237
- West, Wilma L., O.T.R. .... 33
- Willard, Helen S., O.T.R. .... 303

## SCHOOLS

- Columbia University ..... 260
- Illinois, University of ..... 309
- Kalamazoo School of O.T. .... 192
- Mills College—Dept. of O.T. .... 119
- Milwaukee—Downer College—  
Dept. of O.T. .... 118
- Mt. Mary ..... 369
- New York University ..... 370
- Philadelphia School of O.T. .... 48
- Puget Sound, College of ..... 191
- San Jose State College ..... 191
- Southern California, University of,  
O.T. Dept. .... 258
- Toronto, University of ..... 49

## STATE ASSOCIATIONS

- Colorado ..... 43
- Connecticut ..... 184
- District of Columbia ..... 330
- Iowa ..... 391
- Hawaii ..... 41
- Illinois ..... 110
- Indiana ..... 255
- Kansas ..... 254
- Maryland ..... 186
- Massachusetts ..... 112
- Michigan ..... 331
- Missouri ..... 113
- New Jersey ..... 332
- New York ..... 111
- California-Northern ..... 256
- Ohio ..... 185
- California-Southern ..... 185
- Texas ..... 44
- Virginia ..... 252
- Washington ..... 255
- New York-Western ..... 113
- Pennsylvania-Western

## O.T. DEPARTMENTS

- Butler ..... 384
- Delaware Curative Workshop, The .... 306
- Rochester Rehabilitation ..... 385



## FROM LAST TO FIRST

This issue of *The Journal* is the final unit of Volume I. Our first year of publishing our own official Association journal has been filled with interesting experiences for us all.

Those of us charged with editing and producing *The Journal* appreciate sincerely the many written and verbal expressions of interest, encouragement, support and praise which have been received. They are an ever-present challenge to us to continue our efforts to improve the standards under which A-JOT was launched.

So this issue is the last of Volume I. As it goes to the printer we begin work on the first issue of Volume 2.

### *You Will Be Most Helpful . . .*

If you pay your dues and registration fee promptly. Your subscription to Volume 2 is entered when that payment reaches the Association office. By sending it along promptly, you will achieve three objectives:

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